Impulsive Buying Behavior Towards Livestream Shopping through S-O-R Framework: An Islamic Economic Perspective (Case Study of the Central Java Muslim Community)

Shofi Balqissafira Afna, Marwini

Diponegoro University, Indonesia shofibalqis99@gmail.com, marwini@live.undip.ac.id

Abstract

The aim of this study was to analyze the factors that cause impulsive buying behavior towards livestream shopping using the Stimulus-Organism-Response (S-O-R) framework. Data was collected through a questionnaire from the Muslim community of Central Java who had purchased products through livestream shopping, with a sample of 220 respondents. The analysis tool used was SmartPLS 3.2.9, employing the Structural Equation Modeling – Partial Least Squares (SEM-PLS) analysis method. The results showed that stimulus factors such as interpersonal interaction, discount vouchers, and flash sales had a positive and significant effect on the perceived enjoyment of livestream shopping in the Muslim community of Central Java. Furthermore, stimulus factors in the form of purchase convenience, product usefulness, and price also had a positive and significant impact on the perceived usefulness of livestream shopping in the same community. Additionally, the variables related to organism, including the perceived enjoyment and usefulness of livestream shopping, had a positive and significant effect on the impulsive buying behavior of the Muslim community in Central Java.

Keywords: impulsive buying; livestream shopping; S-O-R framework; Structural Equation Model

Permalink/DOI: https://doi.org/10.18326/infsl3.v18i1.115-136

Introduction

In recent years, live-streaming shopping has emerged as a significant trend in the global economy. Platforms such as Facebook, Shopee, and TikTok have embraced live streaming as a means to enhance their competitive edge. Sellers on these platforms use live streaming to effectively market and promote products, giving rise to a new era of social commerce and teleshopping known as Livestream Shopping (Xue et al., 2020).

The phenomenon of live-streaming has changed the way sellers and buyers interact (Xue et al., 2020). In traditional TV shopping, the interaction is mostly one-way, with consumers passively receiving promotional videos from the seller. On the other hand, in online shops, the interaction is limited to monotonous product information conveyed through images and text (Sun et al., 2019). However, in live stream shopping, consumers can watch real-time videos, engage with sellers to discuss their product needs, and receive personalized product recommendations through live question and answer sessions, creating a real-time, two-way interpersonal interaction (Wongkitrungrueng and Assarut, 2020).

Bank Indonesia (2022) reported that the nominal value of e-commerce transactions in 2021 reached IDR 401 trillion. In 2022, the e-commerce transactions increased to IDR 476.3 trillion, showing a nominal increase of 18.78% from the previous period. The growth of e-commerce business in Indonesia is supported, in part, by the increasingly popular live shopping sales strategy. According to Research and Markets (2020), the global live-streaming market is estimated to grow from US\$ 50.24 billion in 2020 to US\$ 184.27 billion in 2027.

Indonesia's e-commerce growth is likely being driven by livestream shopping, which impacts consumers' psychology, leading to impulsive buying and increased sales volume. This research delves deeper into this phenomenon by using the S-O-R (Stimulus-Organism-Response) framework to analyze the stimulus factors that lead consumers to impulsive purchases due to livestream shopping and how consumers respond to these stimuli. Additionally, the research also presents an Islamic perspective regarding the theories and principles of Islamic consumption, as well as how to respond to impulsive buying behavior due to livestream shopping.

This study builds upon the research conducted by Lee and Chen in 2021. It utilizes primary data collected from a different population in Cen-

tral Java Province, Indonesia, which is the fifth most populous province in the country with 37,540,962 inhabitants (BPS, 2023). This suggests a substantial number of internet users in Central Java, which in turn influences the high prevalence of livestream shopping users on e-commerce platforms. Additionally, this study introduces modifications to several independent variables and incorporates aspects of the Islamic economic perspective to examine impulsive buying behavior in the context of livestream shopping.

Literature Review

Consumer Behavior Theory

Research on consumer behavior examines how individuals decide to allocate their time, money, effort, and energy (Schiffman and Kanuk, 2013). Exploring the diversity of consumer types is intriguing because it encompasses individuals from diverse cultural backgrounds, education levels, ages, and various socio-economic conditions.

The theory of consumer behavior has evolved over time with the contributions of various experts. In 1968, prominent marketing experts Engel, Blackwell, and Miniard proposed a model consisting of five key stages: recognizing needs, searching for product information, evaluating alternatives, making a purchase decision, and evaluating the purchase afterwards. In 1970, American psychologist Abraham Maslow introduced the idea that consumer behavior is driven by hierarchical human needs, where lower-level needs must be satisfied before addressing higher-level ones. Later, in 1973, Philip Kotler, another American marketing expert, emphasized that consumer behavior is shaped by a combination of psychological, social, cultural, and personal factors. These contributions illustrate how diverse perspectives have shaped consumer behavior theory over time.

According to Anisa and Sihotang (2021), consumer behavior indicators can be categorized into two types: rational consumption behavior and irrational consumption behavior. Rational consumption behavior involves making appropriate consumption decisions based on needs, while irrational consumption behavior is characterized by consumption driven by desires and emotions. This research specifically examines impulsive buying behavior in the context of livestream shopping as an example of irrational consumer behavior.

Islamic Consumption Theory

Chapra (1985) emphasized that Islamic consumption is guided by principles of justice, balance, and social responsibility, highlighting the importance of spiritual and moral aspects. Similarly, Monzer Kahf (1992) stresses the significance of consuming halal items and avoiding haram ones, while also underlining the social responsibility aspects of Islamic consumption, such as giving *zakat* and *sadaqah*.

Humans have the freedom to consume, but this must be guided by consumption ethics based on Islamic teachings. In Islam, consumption ethics are centered around the principle of *balalan thoyiban* (Muhammad, 2005). This means that fulfilling needs and desires is allowed as long as it can bring benefit, because a Muslim's consumption behavior aims not only to gain satisfaction from goods but also to seek the approval of Allah SWT (Liling, 2019). When it comes to impulsive buying behavior, especially with livestream shopping, it's important for Muslims to consider their primary (*dharuriyyah*), secondary (*bajiyyah*), and tertiary (*tahsiniyah*) needs. This helps in controlling desires by prioritizing the consumption of needs over wants.

In line with the consumption concept according to Al-Ghazali with the following consumption scheme.

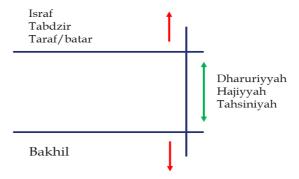


Figure 1. Imam Al-Ghazali's Consumption Scheme

Figure 1 exhibits that Islam does not encourage Muslims to fulfill unlimited desires through consumption. Instead, fulfilling basic needs is sufficient, including *dharuriyyah*, *hajiyyah*, and *tahsiniyyah*. However, Muslims are prohibited from excessive behavior (*israf*), wastefulness (tabdzir), and luxury (taraf). Fulfilling needs should be done within reasonable limits so that it does not lead humans to neglect their worship obligations or distance themselves from God. When it comes to spending wealth, humans are prohibited from being too frugal in the context of spending wealth in obedience to Allah SWT, such as fulfilling their needs, giving zakat, sadaqab, charity, and so on. Being excessively frugal can lead to stinginess and bakbil, saving wealth only for personal gain and ignoring the needs of the surrounding community living in poverty.

S-O-R Theory

This study applies the Stimulus-Organism-Response (S-O-R) theory, a well-established framework extensively tested in exploring the effects of stimuli on consumers' cognitive and emotional states, ultimately shaping consumer intentions or behavior (Mehrabian and Russell, 1974). The S-O-R theory is widely employed to analyze the influence of the external environment on human behavior (Lim et al., 2020).

The Stimulus-Organism-Response (S-O-R) theory has evolved over the years with contributions from various experts. In 1918, Robert S. Woodworth proposed that each stimulus elicits a unique response in individuals, depending on their personal characteristics and social environment. Building on this, in 1943, Clark L. Hull emphasized that an organism's responses are influenced by its motivations and goals. Neal E. Miller (1966) further suggested that internal factors, such as perception, cognition, and emotion, play a key role in shaping responses. In 1964, Richard L. Atkinson focused on how internal factors, including motivation, attitudes, and emotions, affect organism responses. Finally, Edwin A. Locke (1969) highlighted that responses are influenced by the individual's goals. This progression reflects the evolution of the S-O-R theory and its growing emphasis on internal and goal-driven factors.

Livestream shopping utilizes the S-O-R theory to analyze the impact of various stimuli such as interpersonal interactions, discount vouchers, flash sales, purchasing convenience, product usability, and product price on consumer judgment. This, in turn, affects consumer response, particularly impulse buying behavior, based on their perceived enjoyment and usefulness of livestream shopping.

Livestream Shopping

Livestream shopping involves live video and audio interaction, allowing

viewers to engage in real-time and provide feedback through comments. One unique aspect of livestream shopping is the ability for consumers to interact with sellers immediately, creating an immersive and engaging shopping experience and fostering more personal relationships (Wohn et al., 2018). The real-time nature of live streaming enables consumers to experience social presence and connection, even without physical contact.

Consumers who watch live streaming tend to pay more attention to the streamer and may end up making impulse purchases when the streamer introduces a product. This influence on consumers' psychological states can generate more revenue for businesses and platforms (Lu and Chen, 2020).

Impulsive Buying

The concept of impulsive buying was initially studied by DuPont in The DuPont Consumer Buying Habit Studies from 1945 to 1965. DuPont observed that impulsive buying reflects a disparity in behavior between planned and actual purchases. Impulsive buying refers to purchases made suddenly and without prior deliberation by consumers (Karbasivar and Yarahmadi, 2011). This behavior can be viewed as irrational and deviating from the standard shopping process, exhibiting hedonistic characteristics (Parboteeah et al., 2009).

Impulsive buying, as defined by Rook (1987) from a psychological and consumer behavior perspective, occurs when individuals make unplanned purchases driven by a strong urge, often without rational consideration and dominated by emotions. This behavior is influenced by factors such as the shopping environment, personal preferences, personality traits, external stimuli, and the current purchasing situation (Xu et al., 2020).

In the context of livestream shopping, impulsive buying refers to the behavior of consumers who buy products spontaneously and unplanned when watching live streaming on platforms such as Instagram, Facebook, TikTok, Shopee, Lazada, or other livestream shopping platforms. This phenomenon arises from things such as the desire to keep up with the latest trends, a sense of urgency or unexpected need, dependence on technology, shopping addiction, and the influence of social media.

Impulsive Buying Behavior Towards Livestream Shopping from an Islamic Economic Perspective

According to an Islamic perspective, impulsive buying behavior associated with livestream shopping is generally discouraged. Islam places a strong emphasis on financial management and encourages purchases that align with the concept of *maslahah*. Apart from being required to obtain sustenance in a *halal* manner, Muslims are also expected to utilize this sustenance responsibly and avoid excess. The principle of consumption in Islam prohibits wasteful spending, which is closely related to the concept of asceticism—maintaining contentment with the wealth one possesses.

Impulsive purchasing violates *Maqashid Sharia* principles, which include five key aspects: religious protection (*hifz ad-diin*), life protection (*hifz an-nafs*), intellectual protection (*hifz al-'aql*), wealth protection (*hifz al-mal*), and lineage protection (*hifz an-nasb*). *Maqashid Sharia* refers to Allah SWT's regulations and principles that ensure the well-being of His slaves (Syahputri and Fathoni, 2023). These objectives highlight the significance of responsible and conscientious behavior in all parts of life, including financial decisions. Impulsive purchasing, which frequently lacks serious consideration and forethought, contradicts the essential ideals of moderation and wisdom espoused by *Maqashid Sharia*.

As a result, impulsive purchasing behavior while livestream shopping might be regarded imprudent financial management and is negatively proportionate to the idea of *maslahah* in Islamic economics. Aside from that, impulsive buying behavior while live shopping might increase the likelihood of acquiring items that are excessive and unnecessary, leading Muslim customers to engage in *israf* and *tabdzir* conduct.

The Concept of Needs and Wants

The Islamic perspective on *maslabab* underpins the identification of human needs. Islamic consumption theory, which relates to needs and desires, is connected to consumer behavior within the *maqashid sharia* framework (Muhammad, 2005). Al-Ghazali stated that needs are actions taken to meet basic survival requirements. In Islam, consumption aims to strengthen one's relationship with Allah SWT (Nasution et al., 2017).

Equating needs and desires can lead to massive exploitation of natural resources. The gap between unlimited resources and wants is seen as the root of conventional economics (Komala, 2018). When needs and desires are treated as equal, satisfaction becomes the basis of human desires. This view contradicts Al-Ghazali's *maqashid of sharia*, which emphasizes *maslahah* and prioritizes human needs over desires. Islamic economics focuses on essential survival needs, while desires reflect personal inclinations.

Israf and Tabdzir Behavior in Islamic Consumption

Technological advancements like livestream shopping have altered consumer habits, leading to impulsive buying. Islam emphasizes human *maslahah* by setting consumption limits to prevent *israf* (excess) and tabdzir (waste), as well as avoiding *haram* food and drinks (Pratomo & Ermawati, 2019).

Islam forbids actions that lack benefits and those that are excessive, including consumerism, as noted in the Qur'an.

"Say (O Muhammad SAW): "O people of the Scripture (Jews and Christians)! Exceed not the limits in your religion (by believing in something) other than the truth, and do not follow the vain desires of people who went astray in times gone by, and who misled many, and strayed (themselves) from the Right Path." (QS. Al-Ma'idah/5: 77)

The verse emphasizes that excessive (*israf*) and wasteful (*tabdzir*) behaviors are prohibited. Individuals should avoid following their desires, as this leads to error and deviation. Thus, it is crucial to distinguish between essential needs and unlimited desires. Islam encourages generosity and sensitivity to the environment, promoting concern for others' living conditions and simplicity by avoiding waste.

Imam Syafi'i defines *tabdzir* as unjustifiable spending of wealth. Jumhur Ulama states that true goodness does not involve wastefulness. Jumhur Ulama stated that spending money solely for indulgence beyond one's needs is considered *tabdzir*. Islam allows enjoyment but stresses the need for balance. Muslim consumers must differentiate between essential needs and insatiable desires driven by misleading impulses.

Proposed Model and Development of Hypotheses

According to the S-O-R approach, interpersonal interaction, discount vouchers, flash sales, purchase convenience, product usefulness, and product price influence impulsive buying behavior through perceived enjoyment and usefulness. The hypotheses from our model are presented as follows.

Hypothesis 1 (H1). Interpersonal interaction affects perceived enjoyment positively.

Hu and Chaudry (2020) noted that real-time audience interaction fosters social bonds, enhancing customer satisfaction and attachment. Lin et al. (2022) found that interactivity significantly impacts the perceived convenience of livestream shopping. They recommend that streamers incorporate engaging interactive elements to increase audience participation and effectively showcase products or services.

Livestream shopping differs from traditional e-commerce by allowing real-time interaction among consumers, streamers, and fellow shoppers. This engagement enhances focus on product details and boosts digital marketing credibility (Addo et al., 2021). Consumers can ask questions and receive instant feedback, making them feel valued and fulfilled in meeting their needs (Bruce et al., 2018).

Hypothesis 2 (H2). Discount voucher affects perceived enjoyment positively.

Discount vouchers are often exclusive to livestream purchases, encouraging consumer participation. Research by Syastra and Wangdra (2018) shows that 53% of respondents cite discount vouchers as a key factor driving impulsive repeat purchases.

Hypothesis 3 (H3). Flash sale affects perceived enjoyment positively. In livestream shopping, consumers are encouraged to buy during flash sales that temporarily reduce product prices for a limited time, typically lasting from a few minutes to an hour. These sales show the remaining promotional time and the number of items sold, creating psychological pressure to make a purchase.

Syastra and Wangdra (2018) examined factors affecting online impulse buying among 105 respondents, revealing that flash sales, chosen by just 4%, serve as an impulsive stimulus. This research investigates

whether flash sales significantly stimulate consumer engagement in livestream shopping, as they may encourage viewers to keep watching and enhance their emotional responses.

Hypothesis 4 (H4). Purchase convenience affects perceived usefulness positively.

Convenience of purchase is essential in e-commerce quality. Livestream shopping enhances this convenience by simplifying transactions. Chen and Yao (2018) found that impulsive buying behavior is significantly influenced by purchasing convenience, as an easy-to-use system increases purchase likelihood. Lee and Chen (2021) also confirmed that purchasing convenience positively impacts the perceived usefulness of livestream shopping.

Hypothesis 5 (H5). Product usefulness affects perceived usefulness positively.

Consumers are more likely to feel satisfied when they perceive the value of livestream shopping products as aligning with their spending. Park and Lin (2020) found that product usability and suitability positively impact purchase intention, while Lee and Chen (2021) showed that product usability significantly affects the perceived usefulness of livestream shopping.

Hypothesis 6 (H6). Product price affects perceived usefulness positively. Product pricing indicates what consumers pay and heavily influences their purchase decisions. E-commerce platforms facilitate price comparisons, making prices particularly sensitive for low-income consumers. As a result, they are more likely to buy cheaper items, even if they are unnecessary or not part of their original shopping plans (Kimiagari & Malafe, 2021).

Bahrah and Fachira (2021) found that price promotions enhance online impulsive buying, while Gao et al. (2022) showed that product prices in marketing significantly influence consumer perceptions, shaping purchase intentions and decisions.

Hypothesis 7 (H7). Perceived enjoyment affects impulsive buying behavior positively.

Perceived enjoyment in livestream shopping refers to the pleasure and excitement consumers experience during purchases. Le et al. (2022) found it

significantly impacts hedonic shopping value. Similarly, Leeraphong and Sukrat (2018) and Lee and Chen (2021) showed that perceived enjoyment positively affects impulsive buying tendencies on platforms like Facebook Live.

Hypothesis 8 (H8). Perceived usefulness affects impulsive buying behavior positively.

Perceived usefulness of livestream shopping reflects consumers' belief that its features enhance their online shopping experience. Research by Leeraphong and Sukrat (2018) shows that the perceived usefulness of Facebook Live positively influences impulsive purchasing behavior. Consumers find the Facebook Live shopping process convenient, saving time and money. Additionally, many respondents noted that the unique products available on Facebook Live, often at lower prices, contribute to their impulse buying.

The following is Figure 2 which is the theoretical framework developed in this research.

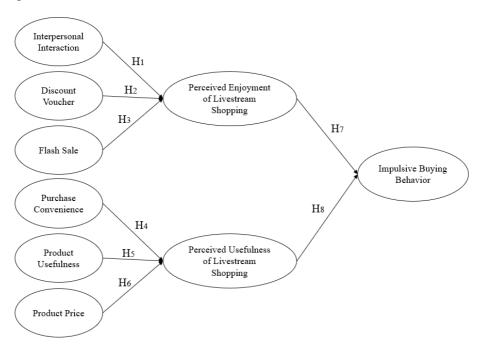


Figure 2. Research Model

Research Methods

This research employed the Structural Equation Model - Partial Least Squares (SEM-PLS) for hypothesis testing. SEM using the Maximum Likelihood Model requires 100 to 200 samples (Ghozali, 2017). Sample size is determined by multiplying the number of indicators by 5 to 10 (Ferdinand, 2006). With 33 indicators, the minimum sample size needed was 165 respondents (33 x 5). An online questionnaire was distributed, yielding 268 respondents, though 48 did not meet the criteria.

This study included 220 Muslim respondents aged 17 and older from Central Java who had made at least one purchase through livestream shopping on platforms such as Shopee Live, TikTok Live, LazLive, Tokopedia Play, or Facebook Live.

Table 1 displays the demographic distribution of respondents along with their frequency and expenditure on livestream shopping.

Table 1. Demographics Statistics (n = 220)

Characteristics	Freq.	Percent (%)	Characteristics	Freq.	Percent (%)			
Gender			Monthly Income					
Female	194	88,2	< IDR 1.000.000	112	50,9			
Male	26	11,8	IDR 1.000.000 – IDR 3.000.000	91	41,4			
Age			IDR 3.000.001 – IDR 7.000.000	12	5,4			
17 - 25	214	97,3	> IDR 7.000.000	5	2,3			
26 – 35	5	2,3						
36 – 45	1	0,4	Monthly Frequency					
Education			of Shopping					
High School	72	32,7	1 - 3 times	175	79,5			
Junior College	9	4,1	4 – 6 times	36	16,4			
Bachelor (S1)	136	61,8	7 - 10 times	7	3,2			
Magister (S2)	3	1,4	> 10 times	2	0,9			
Work								
Student	204	92,7	Monthly					
Teacher/Lecturer	2	0,9	Expenditure					
Employee	8	3,6	< IDR 500.000	177	80,4			
Entrepreneur	1	0,5	IDR 500.000 – IDR 1.000.000	37	16,8			

Characteristics	Freq.	Percent (%)	Characteristics	Freq.	Percent (%)
Civil Servants	1	0,5	IDR 1.000.001 – IDR 3.000.000	5	2,3
Freelancer	2	0,9	> IDR 3.000.000	1	0,5
Unemployed	2	0,9			

Result and Discussion

The following table shows the results of convergent validity and composite reliability tests.

Table 2. Construct on Reliability and Validity

Constructs	Item	Loading Factor	Cron- bach's Alpha	Rho_A	_	Average Variance Extracted (AVE)
Interpersonal	II1	0,833	0,883	0,885	0,920	0,741
Interaction	II2	0,864				
	II3	0,868				
	II4	0,877				
Discount Voucher	DV1	0,898	0,910	0,914	0,937	0,788
	DV2	0,908				
	DV3	0,835				
	DV4	0,909				
Flash Sale	FS1	0,875	0,897	0,900	0,928	0,764
	FS2	0,913				
	FS3	0,835				
	FS4	0,872				
Purchase	PC1	0,906	0,883	0,883	0,928	0,810
Convenience	PC2	0,893				
	PC3	0,900				
Product Usefulness	PRU1	0,892	0,884	0,885	0,928	0,812
	PRU2	0,922				
	PRU3	0,889				
Product Price	PP1	0,834	0,864	0,867	0,918	0,788
	PP2	0,925				
	PP3	0,902				
Perceived Enjoyment	PE1	0,896	0,929	0,929	0,949	0,824
, •	PE2	0,910				

Constructs	Item	Loading Factor	Cron- bach's Alpha	Rho_A	Composite Reliability	Average Vari- ance Extract- ed (AVE)
	PE3	0,913				
	PE4	0,912				
Perceived Usefulness	PU1	0,891	0,907	0,908	0,935	0,781
	PU2	0,880				
	PU3	0,867				
	PU4	0,897				
Impulsive Buying	IB1	0,830	0,881	0,885	0,918	0,738
Behavior	IB2	0,898				
	IB3	0,862				
	IB4	0,844				

All items in Table 2 display convergent validity with loading factors > 0.7, confirming their effectiveness as indicators of the construct variable. The composite reliability test indicated that all construct variables have composite reliability values > 0.7, Cronbach's alpha values > 0.6, and AVE values > 0.5. Therefore, all tested variables are valid and reliable, allowing for structural model testing.

The following table presents the results of the discriminant validity test.

Table 3. Discriminant Validity

Constructs	FS	PP	II	PRU	PC	IB	PU	PE	DV
Flash Sale (FS)	0,874								
Product Price (PP)	0,845	0,888							
Interpersonal Interaction (II)	0,836	0,818	0,861						
Product Usefulness (PRU)	0,792	0,819	0,806	0,901					
Purchase Convenience (PC)	0,836	0,819	0,879	0,798	0,900				
Impulsive Buying	0.771	0,750	0.779	0.689	0.762	0.859			
Behavior (IB)	0,//1	0,700	0,///	0,00)	0,702	0,000			
Perceived Usefulness (PU)	0,855	0,870	0,822	0,803	0,857	0,779	0,884		
Perceived Enjoyment (PE)	0,846	0,851	0,879	0,834	0,878	0,768	0,903	0,908	
Discount Voucher (DV)	0,868	0,857	0,844	0,831	0,853	0,733	0,850	0,879	0,888

Table 3 displays the bold diagonal elements as the square root of the average AVE. A construct variable demonstrates discriminant validity when its value surpasses the correlations with other constructs. The following table presents the results of the path coefficients analysis.

Table 4. Hypothesis Test

	Tuble 1. Trypodicolo Teor							
	Relationships	Original Sample	T- Statistics	P Values	Results			
H1	Interpersonal Interaction → Perceived Enjoyment	0,420	5,888	0,000	Support			
H2	Discount Voucher → Perceived Enjoyment	0,382	5,496	0,000	Support			
НЗ	Flash Sale → Perceived Enjoyment	0,164	2,195	0,029	Support			
H4	Purchase Convenience → Perceived Usefulness	0,389	5,954	0,000	Support			
Н5	Product Usefulness → Perceived Usefulness	0,125	2,264	0,024	Support			
Н6	Product Price → Product Usefulness	0,450	6,064	0,000	Support			
H7	Perceived Enjoyment → Impulsive Buying Behavior	0,350	3,587	0,000	Support			
H8	Product Usefulness → Impulsive Buying Behavior	0,463	5,035	0,000	Support			

The probability value and t-statistic are crucial for hypothesis testing. At a 5% alpha level, a critical value of 1.96 is used (Abdillah & Jogiyanto, 2015). If the t-statistic > 1.96 and the p-value is < 0.05, the Ha is supported, and the H0 is rejected.

The structural path analysis results in Table 4 indicate that interpersonal interaction (t-statistic 5.888 > t-table 1.96, p-value 0.00 < 0.05) has a significant positive effect on perceived enjoyment (H1 supported). Discount vouchers (t-statistic 5.496 > t-table 1.96, p-value 0.00 < 0.05) also have a significant positive effect on perceived enjoyment (H2 supported). Flash sales (t-statistic 2.195 > t-table 1.96, p-value 0.029 < 0.05) has a significant positive effect on perceived enjoyment (H3 supported). Moreover, purchasing convenience (t-statistic 5.954 > t-table 1.96, p-value 0.00 < 0.05) has a significant positive effect on perceived usefulness (H4 supported). Product usefulness (t-statistic 2.264 > t-table 1.96, p-value 0.024 < 0.05) has a significant positive effect on perceived usefulness (H5 supported). Product price (t-statistic 6.064 > t-table 1.96, p-value 0.00 <

0.05 has a significant positive effect on perceived usefulness (H6 supported). The perceived enjoyment of livestream shopping (t-statistic 3.587 > t-table 1.96, p-value 0.00 < 0.05) has a significant positive effect on impulsive buying behavior (H7 supported). Finally, the perceived usefulness of livestream shopping (t-statistic 5.035 > t-table 1.96, p-value 0.00 < 0.05) has a significant positive effect on impulsive buying behavior (H8 supported).

The following table presents a table of R-Square (R2) test results.

Table 5. R-Square Test

Constructs	R Square
Impulsive Buying Behavior	0,630
Perceived Usefulness	0,825
Perceived Enjoyment	0,844

The influence of the independent variable on the dependent variable is indicated by the R² value (Wibisono et al., 2015). According to Chin (1998), R² values > 0.67 signal a strong explanation, values between 0.33 and 0.67 indicate a moderate explanation, and values between 0.19 and 0.33 suggest a weak explanation. In this case, the R² values were 84.4% for perceived enjoyment, 82.5% for perceived usefulness, and 63% for impulsive buying behavior.

Table 5 reveals that interpersonal interaction, voucher discounts, and flash sales explain 84.4% of the variance in perceived enjoyment of livestream shopping, while 15.6% is due to other unexamined factors. In terms of perceived usefulness, purchase convenience, product usefulness, and product price account for 82.5% of the variance, with 17.5% influenced by factors not covered in this study. Furthermore, perceived enjoyment and perceived usefulness together have a moderate impact on impulsive buying behavior, contributing to 63%, leaving 37% attributed to other unaddressed variables.

Conclusion

The analysis reveals that interpersonal interaction, discount vouchers, and flash sales have a significant positive effect on the perceived enjoyment of livestream shopping, confirming their impact on consumers' emotional states. Additionally, purchase convenience, product usefulness, and product price have a significant positive effect on the perceived usefulness of livestream shopping, affecting consumers' cognitive state. Furthermore,

both perceived enjoyment and perceived usefulness have a significant positive effect on impulse buying behavior.

This research aligns with findings by Leeraphong and Sukrat (2018), which demonstrated that perceived enjoyment and usefulness of Facebook Live positively impact consumers' impulsive purchasing desires. We conclude that these perceptions significantly influence impulsive buying behavior during livestream shopping. This effect stems from the immersive and enjoyable experience consumers have while shopping via livestream, compared to traditional online retail. Livestream shopping is seen as enhancing the online shopping experience by providing features that save time, cost, and energy.

Implications for Livestream Shopping Users

The research variables that most influence the perceived enjoyment in livestream shopping are interpersonal interactions and discount vouchers. Users should clarify their needs prior to purchasing to avoid impulsive buying. It is important to prevent consumers from merely satisfying their desires, which can lead to *israf* and *tabdzir* behavior.

The research variables that most influence the perceived usefulness of livestream shopping are product price and purchase convenience. The ease of the livestream shopping feature, combined with often lower prices than those displayed in online shops, simplifies the purchasing process. Users are advised to carefully sort and select the items they need, ensuring that their purchases are well-considered.

Limitations and Future Research

This research has several limitations that future studies aim to address. Firstly, the primary data was gathered exclusively through questionnaires, lacking the depth provided by direct interviews. Secondly, the number of respondents in each district or city was relatively small, which does not accurately reflect the actual situation of the variable test results in those areas. Additionally, the live-stream shopping platform examined was generic and not specific to any one platform. Lastly, there are external variables that have yet to be explored.

The following suggestions should be considered for advancing and renewing research: First, utilize two types of primary data—questionnaires and interviews. Second, expand the research by including respondents

from each district and city in Central Java Province. Finally, compare livestream shopping platforms using the same issue while incorporating other relevant variables.

Bibliography

- Abdillah, W., & Jogiyanto, H. M. (2015). Partial Least Square (PLS): Alternatif Structural Equation Modeling (SEM) dalam Penelitian Bisnis. Yogyakarta: Andi.
- Addo, P. C., Fang, J., Asare, A. O., & Kulbo, N. B. (2021). Customer Engagement and Purchase Intention in Live-Streaming Digital Marketing Platforms. *The Service Industries Journal*, 41(2), 1-20.
- Anisa, N., & Sihotang, H. T. (2021). Perilaku Konsumen Strategi dan Teori. *IOCS Publisher*.
- Bahrah, E. N., & Fachira, I. (2021). The Influence of E-Commerce' Marketing on Impulsive Buying Behaviour. *Advanced International Journal of Business, Entrepreneurship and SMEs*, 3(9), 349-361.
- Bank Indonesia. (2022). *Kajian Stabilitas Keuangan September 2022*. Jakarta: Bank Indonesia.
- BPS. (2023). *Jumlah Penduduk Menurut Kabupaten/Kota di Jawa Tengah (Jiwa)*, 2022-2023. https://jateng.bps.go.id/id/statistics-table/2/NzY2IzI=/jumlah-penduduk-menurut-kabupaten-kota-di-jawa-tengah.html, accessed on November 5, 2024 at 16.21 WIB.
- Bruce, Z. H., Neill, J. T., Sjoblom, M., & Hamari, J. (2018). Social Motivations of Live-Streaming Viewer Engagement on Twitch. *Computers in Human Behavior*, 84, 58-67.
- Chen, C. C., & Yao, J. Y. (2018). What Drives Impulse Buying Behaviors in a Mobile Auction? The Perspective of the Stimulus-Organism Response Model. *Telematics and Informatics*, 35(5), 1249–1262
- Chin, W.W. (1998) The Partial Least Squares Approach to Structural Equation Modeling. *Modern Methods for Business Research*,

- 295, 295-336.
- Ferdinand, A. T. (2006). Metode Penelitian Manajemen: Pedoman Penelitian untuk Penulisan Skirpsi, Tesis dan Disertasi Ilmu Manajemen. Undip Press.
- Gao, H., Chen X., Gao, H., Yu, B. (2022). Understanding Chinese Consumers' Livestreaming Impulsive Buying: A Stimulus-Organism-Response Perspective and the Mediating Role of Emotions and Zhong Yong Tendency. *Frontiers in Psychology*, 13, 1-17.
- Ghozali, I. (2017). *Model Persamaan Struktural Konsep dan Aplikasi dengan Program AMOS 24 Update Bayesian SEM ed. 7.* Semarang: Badan Penerbit Universitas Diponegoro.
- Hu, M., & Chaudhry, S.S. (2020). Enhancing Consumer Engagement in E-commerce Live Streaming via Relational Bonds. *Internet Research*, 30(3), 1019-1041.
- Karbasivar, A., & Yarahmadi, H. (2011). Evaluating Effective Factors on Consumer Impulse Buying Behavior. *Asian Journal of Business Management Studies*, 2(4), 174-181.
- Kimiagari, S., & Malafe, N. S. A. (2021). The Role of Cognitive and Affective Responses in the Relationship between Internal and External Stimuli on Online Impulse Buying Behavior. *Journal of Retailing and Consumer Services*, 61, 102567.
- Komala, C. (2018). Perilaku Konsumsi Impulsive Buying Perspektif Imam Al-Ghazali. *Jurnal Perspektif*, 2(2), 248-266.
- Le, T. Q., Wu, W. Y., Liao, Y. K., & Phung, T. T. T. (2022). The Extended S-O-R Model Investigating Consumer Impulse Buying Behavior in Online Shopping: A Meta-Analysis. *Journal of Distribution Science*, 20(2), 1-9.
- Lee, C. H., & Chen, C. W. (2021). Impulse Buying Behaviors in Live Streaming Commerce Based on the Stimulus-Organism-Response Framework. *Information*, 12(6), 241.
- Leeraphong, A., & Sukrat, S. (2018). How Facebook Live Urge SNS Users to Buy Impulsively on C2C Social Commerce. *Proceed-*

- ings of the 2nd International Conference on E-Society, E-Education, and E-Technology. Hal. 68-72.
- Liling, A. (2019). Konsep Utility Dalam Prilaku Konsumsi Muslim. *Jurnal Balanca*, 1(1), 71-92.
- Lim, X. J., Cheah, J. H., Waller, D. S., Ting, H., & Ng, S.I. (2020) What S-Commerce Implies? Repurchase Intention and Its Antecedents. *Marketing Intelligence and Planning*, 38(6), 760-776.
- Lin, S. C., Tseng, H. T., Shirazi, F., Hajli, N., & Tsai, P. T. (2022). Exploring Factors Influencing Impulse Buying in Live Streaming Shopping: A Stimulus-Organism-Response (SOR) Perspective. *Asia Pacific Journal of Marketing and Logistics*.
- Lu, Z., & Chen, Q. (2020). The Internet Celebrity Effect on Impulsive Consumption Behavior Across Income Levels. *The Frontiers of Society, Science Technology*, 2(13), 39-45.
- Mehrabian, A., & Russell, J. A. (1974). *An Approach to Environmental Psychology*. Cambridge, MA: MIT Press.
- Muhammad. (2005). Ekonomi Mikro Dalam Perspektif Islam. Yog-yakarta: BPFE.
- Nasution, M. E., Setyanto, B., Huda, N., Mufraeni, M. A., & Utama, B. S. (2017). *Pengenalan Eksklusif Ekonomi Islam*. Depok: Kencana.
- Parboteeah, D.V., Valacich, J.S., & Wells, J.D. (2009). The Influence of Website Characteristics on a Consumer's Urge to Buy Impulsively. *Information Systems Research*, 20(1), 60-78.
- Park, H. J., & Lin, L. M. (2020). The Effects of Match-ups on the Consumer Attitudes toward Internet Celebrities and Their Live Streaming Contents in the Context of Product Endorsement. *Journal of Retailing on Consumer Services*, 52, 101934.
- Pratomo, D., & Ermawati, L. (2019). Kecenderungan Pembelian Impulsif Ditinjau dari Perspektif Islam (Studi Kasus Pada Pengunjung Malioboro Mall Yogyakarta). *Jurnal Ekonomi & Ekonomi Syariah*, 2(2), 240-252.

- Research and Markets. (2020). "Video Streaming Market Size, Share and Trends Analysis Report by Streaming Type, by Solution, by Platform, by Service, by Revenue Model, by Deployment Type, by User, by Region, and Segment Forecasts, 2020-2027". www.researchandmarkets.com/reports/4700903, diakses pada 28 November 2022 pukul 18.53 WIB.
- Rook, D. W. (1987). The Buying Impulse. *Journal of Consumer Research*, 14(2), 189-199.
- Schiffman, L. G., & Kanuk, L. L. (2013). *Perilaku Konsumen*. Jakarta: PT. Indeks.
- Sun, Y., Shao, X., Li, X., Guo, Y., & Nie, K. (2019). How Live Streaming Influences Purchase Intentions in Social Commerce: An IT Affordance Perspective. *Electronic Commerce Research and Applications*, 37, 1-12.
- Syahputri, T. H., & Fathoni, M. A. (2023). Community-Based Empowerment in The Perspective of Maqasid Al-Shari'a. *INFERENSI: Jurnal Penelitian Sosial Keagamaan*, 17(1), 1-22.
- Syastra, M. T., & Wangdra, Y. (2018). Analisis Online Impulse Buying dengan menggunakan Framework SOR. *Jurnal Sistem Informasi Bisnis*, 8(2), 133-140.
- Wibisono, A., Anwar, M. and Kirono, I. (2015). Stuctural Equation Modeling Partial Least Square (SEM PLS) untuk Mengetahui Kinerja Karyawan pada Pt. Dempo Laser Metalindo Surabaya. *Jurnal Ilmiah Teori dan Aplikasi Statistika*, 7(1), 15-24.
- Wohn, D. Y., Freeman, G., & McLaughlin, C. (2018). Explaining Viewers' Emotional, Instrumental, and Financial Support Provision for Live Streamers. *Proceedings of the 2018 CHI Conference on Human Factors in Computing Systems*, Montréal, QC, Canada: 21-26 April 2018. Hal. 1-13.
- Wongkitrungrueng, A., & Assarut, N. (2020). The Role of Live Streaming in Building Consumer Trust and Engagement with Social Commerce Sellers. *Journal of Business Research*, 117, 543-556.
- Xu, X., Wu, J. H., & Li, Q. (2020). What Drives Consumer Shopping Behavior in Live Streaming Commerce? *Journal of Electronic*

Commerce Research, 21(3), 144-167.

Xue, J., Liang, X., Xie, T., & Wang, H. (2020). See Now, Act Now: How to Interact with Customers to Enhance Social Commerce Engagement? *Information and Management*, 57(6), 1-26.