

The Key Influencing Factors on Purchase Intention Via Live Streaming in China

Lim Kim Yew¹, Yang Ziyi², Yang Chen¹, Tan Owee Kowang³, Lester Naces Udang^{4,5}

¹Faculty of Business and Communication, INTI International University

²Hebei Finance University, Baoding, Hebei, China

³Faculty of Management, Universiti Teknologi Malaysia

⁴Faculty of Education, Shinawatra University, Thailand

⁵College of Education, University of the Philippines Diliman

Email: kimyew.lim@newinti.edu.my

Abstract

This conceptual paper develops a UTAUT-based conceptual framework to examine the relationships between performance expectancy, effort expectancy, social influence, hedonic motivation and purchase intention through live streaming. In previous studies, Online purchase intention has been an important research topic in e-commerce research field, while relevant research in the live streaming context is still in its infancy. On the other hand, the competition in live streaming shopping industry is too fierce which makes the profit distribution extremely unbalanced. This study aims to fill the research gap by investigating the influencing factors of purchase intention through live streaming from a technology adoption perspective in China context, to offer suggestions for small streamers to find new breakthroughs to attract more consumers. This study adopts PLS-SEM and Smart PLS 3.0 software to analyze the data. It is predicted that all these four constructs namely, performance expectancy, effort expectancy, social influence and hedonic motivation have positive and significant influence on purchase intention through live streaming. The conceptual framework developed in this study can be useful to explain the influencing factors of consumers purchase intention via live streaming. By exploring the influence factors of purchase intention through live streaming, it is hoped that this study can provide new ideas for small entrepreneurs to attract more customers via online platforms.

Keywords: Purchase Intention, performance expectancy, effort expectancy, social influence, hedonic motivation.

Live streaming refers to online streaming media which simultaneously recorded and broadcast the audio or video via the Internet in real time (C. C. Chen & Lin, 2018; Hilvert-Bruce et al., 2018). It is a new Internet-based interactive social media form for entertainment (Hilvert-

Bruce et al., 2018). Compared with other social media, live streaming owns many advantages, such as high visualization, real time interaction, ease of use, realness, simultaneity, authenticity, vividness, low cost (C. C. Chen & Lin, 2018; C. Y. Lu et al., 2020; Scheibe et al., 2016; Tang et

al., 2016; Tong, 2017), etc. Moreover, since it is a type of audio and video media by nature, it presents a high degree of entertainment (Bründl et al., 2017; C. C. Chen & Lin, 2018). By watching live streaming, people can feel a kind of immersion and their curiosity is better satisfied. These characteristics made it quickly attract a large amount number of users. In China, by December 2021, the number of online live streaming users had reached 703 million, accounting for 68.2% of the total Internet users (China Internet Network Information Center, 2022).

The rapid popularity of live streaming has given birth to a new e-commerce mode through live streaming. In live streaming shopping, detailed information, user experience and real trial of the products are clearly shown, real-time counseling and interaction become possible. (Zhang et al., 2020). In China, by December 2021, consumers who use live streaming to buy things were already 464 million people, accounting for 44.9% of the Internet users (China Internet Network Information Center, 2022).

However, the influx of a large number of streamers makes the competition of live streaming shopping industry more and more fierce. The beneficiaries are mainly concentrated on a few head streamers, which makes the profit distribution unbalanced. Meanwhile, since the celebrity effect plays an important part in this industry, this pattern has basically been fixed. That is to say, it is too difficult for small streamers to grow up and compete with the existing head streamers. In order to break this situation, it is necessary to know about the main influencing factors of consumers' purchase intention through live streaming to make live streaming shopping industry a more balanced development mechanism and environment.

In the previous studies, although online purchase intention in the traditional e-commerce context has already been widely investigated, as a new trend of e-commerce way, the relevant research on live streaming shopping is still in its infancy (B. Lu & Chen, 2021). Therefore, it is

necessary to better understand the influencing factors of consumers' purchase intention through live streaming, so as to better stimulate consumers' purchase motivation.

Purchase Intention

The concept of purchase intention is originated from the concept of behavioral intention in social psychology area. According to Fishbein & Ajzen (1975), behavioral intention is a person's subjective probability to perform a behavior which will influence people's performance or nonperformance. Extending into marketing research, the behavioral intention to purchase is usually interpreted as purchase intention, which is widely explained as a consumer's willingness or likelihood to buy a certain product (Dodds et al., 1991; Mullet & Karson, 1985). Purchase intention is an important and effective indicator to predict the probability of consumers' actual purchase behavior (Mullet & Karson, 1985).

Entering into the 21st century, the popularization of Internet promotes the rapid development of e-commerce, which has made online shopping a popular alternative to traditional way of shopping (Hill & Beatty, 2011). Since online shopping has many different characteristics from traditional retail context, in order to learn how to attract more consumers, online purchase intention has been a hot topic in e-commerce and marketing research. One of the main research directions is to investigate the influencing factors of online purchase intention in the view of consumers' acceptance of new technology.

As a newly emerged but fast developed e-commerce form, live streaming shopping has already aroused some researchers' attentions. Liu et al., (2020) explored the influence of live streaming on consumers' adoption intention of mobile commerce focusing on the enjoyment feeling. The results showed that consumers' adoption intention is affected by perceived enjoyment, perceived enjoyment is affected by visual scene and social presence, social presence is affected by visual scene and communication

function. Xu et al., (2020) developed a stimulus–organism–response (S-O-R) framework to investigate how contextual and environmental stimuli factors (streamer attractiveness, para-social interactions and information quality) affect viewers' cognitive and emotional states (cognitive assimilation and arousal), and in turn influence consumer behaviors through live streaming (hedonic consumption, impulsive consumption and social sharing). The results confirmed two influence paths: streamer attractiveness and para-social interaction affect the three response behaviors by the mediation of arousal; information quality affects the three response behaviors by the mediation of cognitive assimilation (Tee et al., 2022).

Bründl et al., (2017) investigated the determinants of consumers' enjoyment in live streaming shopping by divided enjoyment into active behavior (chatting) and passive behavior (watching). The results showed that consumers' perceived co-experience has a strong positive effect on the enjoyment of both active behavior passive behavior; while perceived effectance only has a positive impact on the enjoyment of active behavior. Wongkitrungrueng & Assarut, (2020) examined the relationships among customers' perceived value of live streaming, customer trust, and engagement. The study found that symbolic value has a direct and indirect effect via trust in sellers on customer engagement, while utilitarian and hedonic values affect customer engagement indirectly through customer trust in products and trust in sellers sequentially.

Performance Expectancy

Performance expectancy is an important influencing factor to behavioral intention in UTAUT, which was formulated from similar constructs in the existing research models, including perceived usefulness in TAM/TAM2 and C-TAM-TPB, extrinsic motivation in MM, job-fit in MPCU, relative advantage in IDT and outcome expectations in SCT. It is defined as the degree to which an individual believes that using the system will help him or her to attain gains in

job performance (Venkatesh et al., 2003). That is to say, when the users believe that using the new technology will be useful for them, they will be more inclined to use and accept it (Davis, 1989). Performance here can be interpreted as the usefulness, productivity, effectiveness, chances to get a raise in peoples' work, which can help them get a better performance in job (Davis, 1989; Venkatesh et al., 2003). It reflects the extrinsic motivation to individuals' intention to use a technology (Blaise et al., 2018; Dewi et al., 2020), as well as the users' (or consumers') pursuing of the utilitarian value of a technology (Celik, 2016; Yuan et al., 2015). According to the measurement conducted in the original UTAUT, it is found that performance expectancy is the strongest determinant to behavior intention (Venkatesh et al., 2003), which is consist with the findings of the importance of similar constructs in some other models such as TAM (Davis et al., 1989) and IDT (Rogers Everett, 1995).

In almost all the UTAUT based technology acceptance researches, the investigation on the effect of performance expectation has never been omitted. Its' major effect to behavior intention has been confirmed in many empirical studies (Morosan & Defranco, 2016; Pascual-miguel et al., 2015; Sharifi fard et al., 2016; Tarhini et al., 2017). In the e-commerce context, performance expectancy can be understood as the degree to which a consumer believe that shopping through the Internet will provide benefits (Marinković et al., 2020). The characteristics of e-commerce determine its advantages such as time or cost saving, no time and space constrains, quick responses, which can bring consumers benefits so that to improve shopping performance (Singh et al., 2017; Turban et al., 2004). There are already many studies have proven that performance expectancy has a significant positive influence on the consumers' online purchase intention. The specific research contexts include online shopping in one specific country (area) or in one specific group of consumers, as well as for one specific category

of products, etc. (An et al., 2016; Dewi et al., 2020; Escobar-Rodríguez & Carvajal-Trujillo, 2013; Musleh et al., 2015; San Martín & Herrero, 2012; Sharifi fard et al., 2016).

In live streaming shopping, consumers can know more about the products in detail via the streamer's introduction, display and trail. The quality of the product is more guaranteed. In a way, it saves time to see the real item in a physical store. Moreover, it is usually cost-effective than directly buying through traditional way of online shopping. All of these are the benefits consumers can get by shopping through live streaming which may be attractions to them. Therefore, in this study, it is hypothesized that:

H1: There is a positive relationship between performance expectancy (PE) and purchase intention through live streaming.

Effort Expectancy

Effort expectancy is another variable in UTAUT, which is developed on the basis of perceived ease of use in TAM/ TAM2, complexity in MPCU and ease of use in IDT. According to the explanation in original UTAUT, effort expectancy means the degree of ease associated with the use of the system (Venkatesh et al., 2003). That is to say, the easier and more convenient the technology is, the more likely users intend to use it (Perea Y Monsués et al., 2004; Yuan et al., 2015). In UTAUT, effort expectancy is proved as another essential determinant to behavior intention, while the strength of the effect tends to be nonsignificant over periods of extended and sustained usage. (Venkatesh et al., 2003).

In the technology acceptance related studies, the impact of effort expectancy has also been widely tested. In most online shopping related studies, the influence of effort expectancy on online purchase intention has still been proven to be significant (An et al., 2016; Dewi et al., 2020; Escobar-Rodríguez & Carvajal-Trujillo, 2014; Musleh et al., 2015; Pascual-miguel et al., 2015). For online consumers, on the one hand, reducing efforts is one important motivation for consumers to shop online; on the other hand, too

complex using procedures prevent online shopping intention (Celik, 2016).

As a new and developing technology, live streaming itself is not difficult to find and watch. However, when using the transaction function, the operation may become a little complicated for some of the consumers. For example, how to find the right products, how and where to place an order, how to use the discount, etc. The simplicity in terms of these factors the consumers feel may affect their purchase intention. Therefore, in this study, it is hypothesized that:

H2: There is a positive relationship between effort expectancy and purchase intention through live streaming.

Social Influence

Social influence is also proved as a determinant that has significant influence on behavioral intention, especially for the adoption of a new technology (Blaise et al., 2018). It is used into UTAUT by summarizing three existing constructs in other research models which are subjective norms in TRA, TAM2, TPB/DTPB and C-TAM-TPB, social factors in MPCU as well as image in IDT. According to Venkatesh et al., (2003)'s definition in UTAUT, social influence refers to the degree to which an individual perceives that important others believe he or she should use the new system which emphasizes on the voices from others. The source of the influence might be families, friends or other people who are considered important. (Venkatesh et al., 2003)

The impact of social influence on behavior intention has also been tested in many UTAUT based studies. Many studies have shown that social influence has significant positive influence on online purchase intention (Dewi et al., 2020; Escobar-Rodríguez & Carvajal-Trujillo, 2013; Musleh et al., 2015). Internet offers a new platform to make more friends and communicate with more people. Under this environment, except people around, information from the Internet becomes another source of influence. To purchase intention, this kind of

social influence may come from the opinions of net friends, key opinion leaders and early adopters. (Y. A. Kim & Srivastava, 2007) Bearden et al., (1986) divided social influence during the adoption of a new product into normative social influence and informational social influence. Normative social influence creates a kind of social pressure for people to adopt a product, people who do not adopt it may be regarded as old fashioned. While informational social influence is a learning process through which people observe the experience of early adopters' purchase intention.

In the social media and live streaming shopping context, except the influence from friends and families, social interaction and word of mouth (WOM) are considered more important (C. C. Chen & Lin, 2018; Hajli, 2012; Hilvert-Bruce et al., 2018; Y. Wang & Yu, 2017; Yu et al., 2018), the influence from opinion leaders (influential celebrities or famous streamers who recommend products through Internet) becomes greater (Cai et al., 2018; Y.-F. Chen et al., 2017; Hu et al., 2017; Lin et al., 2021; Nunes et al., 2018; Park & Lin, 2020; Xu et al., 2020). Thus, it is predicted that in live streaming shopping process, social influence should have an impact on purchase intention. In this study, it is hypothesized that:

H3: There is a positive and significant relationship between social influence and purchase intention through live streaming.

Hedonic Motivation

According to motivation theory, motivation to perform an activity can be divided into two types: extrinsic motivation and intrinsic motivation (Calder & Staw, 1975; Scott Jr et al., 1988). Extrinsic motivation refers to the motivation to achieve some external goal or satisfy some external constraint, while intrinsic motivation indicates the motivation for the pure enjoyment of the task itself (Hennessey et al., 2015). Hedonic motivation belongs to intrinsic motivation (Davis et al., 1992).

The word "hedonic" means relating to or characterized by pleasure. According to

Venkatesh et al., (2012) hedonic motivation refers to the fun or pleasure gained from the use of a technology. Similar construct in TAM based studies is called perceived enjoyment (Venkatesh et al., 2012; Venkatesh & Bala, 2008). Other similar expressions include fun, enjoyment, playfulness, entertainment, hedonic expectancy, etc (Alalwan et al., 2018; Tamilmani et al., 2019). It has been proved that hedonic motivation is one influencing factor on the intention as well as the actual use of a technology (Thong et al., 2006; Van Der Heijden, 2004). Hedonic motivation is believed as an essential extension in UTAUT2 since it reflects the importance of intrinsic motivation besides extrinsic motivation in the process of new technology acceptance and use, especially in consumer context (Alalwan et al., 2018; Tamilmani et al., 2019).

In consumer behavior relevant researches, hedonic motivation is often studied on the contrary of utilitarian motivation. Utilitarian is more task-oriented and put emphasis on the function and usefulness aspect, while hedonic pursues fun, exciting and enjoyable (Babin et al., 1994; Y. H. Kim et al., 2013). Hedonic or utilitarian nature of an information system affects what shapes the intention to use (Van Der Heijden, 2004).

To better measure the hedonic motivation in the shopping process, Babin et al., (1994) developed a 15-items-scale measuring hedonic and utilitarian values in consumers' consumption experiences and found that distinct hedonic and utilitarian shopping value dimensions exist. Arnold & Reynolds, (2003) developed a scale measuring hedonic shopping motivations from six perspectives namely. adventure, gratification, role, value, social, and idea shopping motivations, then divided consumers into 5 clusters named the minimalists, the gatherers, the providers, the enthusiasts, and the traditionalists

In the previous studies, the influence of hedonic motivation on the behavior intention of Internet or mobile based technologies has been investigated. Most of the relationships were

proved to be significant, for example in the adoption of Internet or mobile banking (Alalwan et al., 2015; Baptista & Oliveira, 2015; Sharif & Raza, 2017), information system (Beqqali Hassani et al., 2020), mobile social networking sites (SNS) (Guo, 2015) etc. For entertainment-oriented technologies, for example in social media (Martín-Consuegra et al., 2019), the effects of hedonic motivation are strong (Alalwan, 2018; Arum & Sung, 2018; Guo, 2015; Martín-Consuegra et al., 2019; Sharifi fard et al., 2016).

In the online shopping context, the influence of hedonic motivation on online purchase intention has also been proved (An et al., 2016; Escobar-Rodríguez & Carvajal-Trujillo, 2014; Sharifi fard et al., 2016). Some scholars have used some other similar expressions like enjoyment, perceived enjoyment, shopping enjoyment, entertainment, playfulness and have also proven their influences on online purchase intention (Arli, 2017; Chu & Lu, 2007; Fu et al., 2018; Khalid et al., 2018; Tan Pei Kian et al., 2017; Yang, 2010).

For live streaming, entertainment is an essential function (Bründl et al., 2017; C. C. Chen & Lin, 2018). In the researches related to behavior in live streaming context, the influence of hedonic factors are usually considered (Hilvert-Bruce et al., 2018; Lin et al., 2021). Moreover, the influence from hedonic aspects in the adoption process of live streaming shopping has also been proved (Bründl et al., 2017; Cai et al., 2018; Liu et al., 2020; Park & Lin, 2020; Z. Wang et al., 2018; Xu et al., 2020). In the shopping process, hedonic motivations include the enjoyment of the experience, the desire for entertainment and escapism, the enjoyment for hunting discount and bargain (Loo et al., 2024). These are exactly what live streaming shopping can provide. Therefore, in this study, it is hypothesized that:

H4: There is a positive and significant relationship between hedonic motivation and purchase intention through live streaming.

Conceptual Framework and Conclusion

Based on the review and discussion before, the conceptual framework of the present study is developed to confirm the relationships between performance expectancy, effort expectancy, social influence, hedonic motivation and purchase intention through live streaming, which is exhibited in Figure 1.

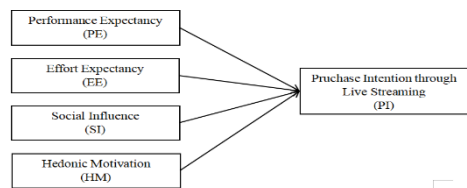


Figure 1. Conceptual Framework

It is predicted that all these four constructs namely, performance expectancy, effort expectancy, social influence and hedonic motivation have positive and significant influence on purchase intention through live streaming. This newly developed framework is assumed to be useful to explain the influencing factors of consumers' purchase intention through live streaming. Facilitating conditions, perceived price value and habit are omitted in this study. The reasons include two aspects. The first reason is because mobile phone and network has already been highly covered and popularized among citizens, facilitating conditions and perceived price are no more important determinants for the usage of Internet based technologies. Another reason is habit and facilitating conditions are considered as direct determinants to the actual usage of technology, so that these two factors are not theorized in this framework. Since predicting the relationship is the main concern, rather than theory testing, this study adopts PLS-SEM and Smart PLS 3.0 software to analyze the data (Hair Jr et al., 2014). By exploring the influence factors of purchase intention through live streaming, it is hoped that this paper can provide new ideas for small entrepreneurs to attract more consumers via online platforms.

WORKS CITED

- Alalwan, A. A. (2018). Investigating the impact of social media advertising features on customer purchase intention. *International Journal of Information Management*, 42(April), 65-77.
- Alalwan, A. A., Dwivedi, Y. K., Rana, N. P., & Algharabat, R. (2018). Examining factors influencing Jordanian customers' intentions and adoption of internet banking: Extending UTAUT2 with risk. *Journal of Retailing and Consumer Services*, 40(July 2017), 125-138.
- Alalwan, A. A., Dwivedi, Y. K., Rana, N. P., Lal, B., & Williams, M. D. (2015). Consumer adoption of Internet banking in Jordan: Examining the role of hedonic motivation, habit, self-efficacy and trust. *Journal of Financial Services Marketing*, 20(2), 145-157.
- An, L., Han, Y., & Tong, L. (2016). Study on the Factors of Online Shopping Intention for Fresh Agricultural Products Based on UTAUT2. *Proceedings of the 2nd Information Technology and Mechatronics Engineering Conference (ITOEC 2016)*, Itoec, 303-306.
- Arli, D. (2017). Does Social Media Matter? Investigating the Effect of Social Media Features on Consumer Attitudes. *Journal of Promotion Management*, 23(4), 521-539.
- Arnold, M. J., & Reynolds, K. E. (2003). Hedonic shopping motivations. *Journal of Retailing*, 79(2), 77-95.
- Arum, E. S., & Sung, M. (2018). The Effect of Social Media Attributes on Purchase Intention through Motivation Dimensions and Social Media Product Browsing. *Journal of Marketing Thought*, 5(2), 12-22.
- Babin, B. J., Darden, W. R., & Griffin, M. (1994). Work and/or Fun: Measuring Hedonic and Utilitarian Shopping Value. *Journal of Consumer Research*, 20(4), 644-657.
- Baptista, G., & Oliveira, T. (2015). Understanding mobile banking : The unified theory of acceptance and use of technology combined with cultural moderators. *Computers in Human Behavior*, 50, 418-430.
- Bearden, W. O., Calcich, S. E., Netemeyer, R., & Teel, J. E. (1986). An exploratory investigation of consumer innovativeness and interpersonal influences. *ACR North American Advances*, 13(1), 77-82.
- Beqqali Hassani, I., Chroqui, R., Okar, C., Talea, M., & Ouiddad, A. (2020). Impact of hedonic motivation and corporate culture on the adoption of an information system. *Kybernetes*, 49(5), 1561-1578.
- Blaise, R., Halloran, M., & Muchnick, M. (2018). Mobile Commerce Competitive Advantage: A Quantitative Study of Variables that Predict M-Commerce Purchase Intentions. *Journal of Internet Commerce*, 17(2), 96-114.
- Bründl, S., Matt, C., & Hess, T. (2017). Consumer use of social live streaming services: The influence of co-experience and effectance on enjoyment. *Proceedings of the 25th European Conference on Information Systems*, ECIS 2017, January 2018, 1775-1791.
- Cai, J., Wohn, D. Y., Mittal, A., & Sureshbabu, D. (2018). Utilitarian and hedonic motivations for live streaming shopping. *TVX 2018 - Proceedings of the 2018 ACM International Conference on Interactive Experiences for TV and Online Video*, June 2018, 81-88.
- Calder, B. J., & Staw, B. M. (1975). Self-perception of intrinsic and extrinsic motivation. *Journal of Personality and Social Psychology*, 31(4), 599.
- Celik, H. (2016). Customer online shopping anxiety within the Unified Theory of Acceptance and Use Technology (UTAUT) framework. *Asia Pacific Journal of Marketing and Logistics*, 28(2), 278-307.
- Chen, C. C., & Lin, Y. C. (2018). What drives live-stream usage intention? The perspectives of flow, entertainment, social interaction, and endorsement. *Telematics and Informatics*, 35(1), 293-303.
- Chen, Y.-F., Tsai, C., & Lin, P. (2017). The Influence of Perceived Risk, Shopping Value and Opinion Leader to Explore Online Consumer Purchase Intention: Using Social Network Analysis. *International Journal of E-Adoption*, 9(2), 31-58.
- China Internet Network Information Center. (2022). The 49th Statistical Report on Internet Development in China. <http://www.cnnic.cn/hlwfyj/hlwzbg/hlwtjbg/202202/P020220721404263787858.pdf>
- Chu, C., & Lu, H. (2007). Factors influencing online music purchase intention in Taiwan. In *Internet Research* (Vol. 17, Issue 2, pp. 139-155).
- Davis, F. D. (1989). Perceived usefulness, perceived ease of use, and user acceptance of information technology. *MIS Quarterly: Management Information Systems*, 13(3), 319-339.
- Davis, F. D., Bagozzi, R. P., & Warshaw, P. R. (1989). User Acceptance of Computer Technology: A Comparison of Two Theoretical Models. *Management Science*, 35(8), 982-1003.
- Davis, F. D., Bagozzi, R. P., & Warshaw, P. R. (1992). Extrinsic and Intrinsic Motivation to Use Computers in the Workplace. *Journal of Applied Social Psychology*, 22(14), 1111-1132.

- Dewi, C. K., Mohaidin, Z., & Murshid, M. A. (2020). Determinants of online purchase intention: a PLS-SEM approach: evidence from Indonesia. *Journal of Asia Business Studies*, 14(3), 281-306.
- Dodds, W. B., Monroe, K. B., & Grewal, D. (1991). Effects of Price, Brand, and Store Information on Buyers' Product Evaluations. *Journal of Marketing Research*, 28(3), 307.
- Escobar-Rodríguez, T., & Carvajal-Trujillo, E. (2013). Online drivers of consumer purchase of website airline tickets. *Journal of Air Transport Management*, 32, 58-64.
- Escobar-Rodríguez, T., & Carvajal-Trujillo, E. (2014). Online purchasing tickets for low cost carriers: An application of the unified theory of acceptance and use of technology (UTAUT) model. *Tourism Management*, 43, 70-88.
- Fishbein, M., & Ajzen, I. (1975). Beliefs, attitude, intention, and behavior: An introduction to theory and research. In *Strategies of Change: Persuasive Communication*.
- Fu, S., Yan, Q., & Feng, G. C. (2018). Who will attract you? Similarity effect among users on online purchase intention of movie tickets in the social shopping context. *International Journal of Information Management*, 40(February 2017), 88-102.
- Guo, Y. (2015). Moderating effects of gender in the acceptance of mobile SNS-Based on UTAUT model. *International Journal of Smart Home*, 9(1), 203-216.
- Hair Jr, J. F., Hult, G. T. M., Ringle, C. M., & Sarstedt, M. (2014). *A primer on partial least squares structural equation modeling (PLS-SEM)*. Sage publications.
- Hajli, M. (2012). An integrated model for E-commerce adoption at the customer level with the impact of social commerce. 10, 77-97.
- Hennessey, B., Moran, S., Altringer, B., & Amabile, T. M. (2015). *Extrinsic and Intrinsic Motivation*. Wiley Encyclopedia of Management, 1-4.
- Hill, W. W., & Beatty, S. E. (2011). A model of adolescents' online consumer self-efficacy (OCSE). *Journal of Business Research*, 64(10), 1025-1033.
- Hilvert-Bruce, Z., Neill, J. T., Sjöblom, M., & Hamari, J. (2018). Social motivations of live-streaming viewer engagement on Twitch. *Computers in Human Behavior*, 84, 58-67.
- Hu, M., Zhang, M., & Wang, Y. (2017). Why do audiences choose to keep watching on live video streaming platforms? An explanation of dual identification framework. *Computers in Human Behavior*, 75, 594-606.
- Khalid, S., Jalees, T., & Malik, K. (2018). Extending the TAM Model for Understanding Antecedents to Online Purchase Intentions. *Market Forces*, XIII(1), 90-112.
- Kim, Y. A., & Srivastava, J. (2007). Impact of social influence in e-commerce decision making. *ACM International Conference Proceeding Series*, 258, 293-302.
- Kim, Y. H., Kim, D. J., & Wachter, K. (2013). A study of mobile user engagement (MoEN): Engagement motivations, perceived value, satisfaction, and continued engagement intention. *Decision Support Systems*, 56(1), 361-370.
- Lin, G.-Y., Wang, Y.-S., Wang, Y.-M., & Lee, M.-H. (2021). What drives people's intention toward live stream broadcasting. *Online Information Review*, ahead-of-p(ahead-of-print).
- Liu, Z., Yang, J., & Ling, L. (2020). Exploring the influence of live streaming in mobile commerce on adoption intention from a social presence perspective. *International Journal of Mobile Human Computer Interaction*, 12(2), 53-71.
- Loo, S. H., Wider, W., Lajuma, S., Jiang, L., Kenikasahmanworakhun, P., Tanucan, J. C. M., & Ahmad Khadri, M. W. A. (2024). Key factors affecting employee job satisfaction in Malaysian manufacturing firms post COVID-19 pandemic: a Delphi study. *Cogent Business & Management*, 11(1).
- Lu, B., & Chen, Z. (2021). Live streaming commerce and consumers' purchase intention: An uncertainty reduction perspective. *Information and Management*, 58(7), 103509.
- Lu, C. Y., Marek, M. W., Chen, B. T., & Pai, I. C. (2020). An Exploratory Study on Consumer Purchase Behavior From Live Webcasting E-Commerce. *International Journal of Online Marketing*, 10(3), 1-20.
- Marinković, V., Đorđević, A., & Kalinić, Z. (2020). The moderating effects of gender on customer satisfaction and continuance intention in mobile commerce: a UTAUT-based perspective. *Technology Analysis and Strategic Management*, 32(3), 306-318.
- Martín-Consuegra, D., Díaz, E., Gómez, M., & Molina, A. (2019). Examining consumer luxury brand-related behavior intentions in a social media context: The moderating role of hedonic and utilitarian motivations. *Physiology and Behavior*, 200(January), 104-110.

- Morosan, C., & Defranco, A. (2016). It's about time : Revisiting UTAUT2 to examine consumers ' intentions to use NFC mobile payments in hotels. *International Journal of Hospitality Management*, 53, 17-29.
- Mullet, G. M., & Karson, M. J. (1985). Analysis of Purchase Intent Scales Weighted by Probability of Actual Purchase. *Journal of Marketing Research*, 22(1), 93.
- Musleh, J. S. A., Marthandan, G., & Aziz, N. (2015). An extension of UTAUT model for Palestine e-commerce. *Electronic Business*, 12(1).
- Nunes, R. H., Ferreira, J. B., de Freitas, A. S., & Ramos, F. L. (2018). Efeitos das recomendações de líderes de opinião em mídias sociais sobre a intenção de compra de seus seguidores. *Revista Brasileira de Gestao de Negocios*, 20(1), 57-73.
- 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 and Consumer Services*, 52(May 2019), 101934.
- Pascual-miguel, F. J., Agudo-peregrina, Á. F., & Chaparro-peláez, J. (2015). Influences of gender and product type on online purchasing. *Journal of Business Research*, 1-7.
- Perea Y Monsuwé, T., Dellaert, B. G. C., & De Ruyter, K. (2004). What drives consumers to shop online? A literature review. In *International Journal of Service Industry Management* (Vol. 15, Issue 1, pp. 102-121).
- Rogers Everett, M. (1995). Diffusion of innovations. In New York (Vol. 12).
- San Martín, H., & Herrero, Á. (2012). Influence of the user's psychological factors on the online purchase intention in rural tourism: Integrating innovativeness to the UTAUT framework. *Tourism Management*, 33(2), 341-350.
- Scheibe, K., Fietkiewicz, K. J., & Stock, W. G. (2016). Information Behavior on Social Live Streaming Services. *Journal of Information Science Theory and Practice*, 4(2), 6-20.
- Scott Jr, W. E., Farh, J.-L., & Podsakoff, P. M. (1988). The effects of "intrinsic" and "extrinsic" reinforcement contingencies on task behavior. *Organizational Behavior and Human Decision Processes*, 41(3), 405-425.
- Sharif, A., & Raza, S. A. (2017). The influence of hedonic motivation, self-efficacy, trust and habit on adoption of internet banking: A case of developing country. *International Journal of Electronic Customer Relationship Management*, 11(1), 1-22.
- Sharifi fard, S., Tamam, E., Hj Hassan, M. S., Waheed, M., & Zaremohzzabieh, Z. (2016). Factors affecting Malaysian university students' purchase intention in social networking sites. *Cogent Business and Management*, 3(1), 1-12.
- Singh, A., Alryalat, M. A. A., Alzubi, J. A., & Sarma, H. K. D. (2017). Understanding jordanian consumers' online purchase intentions: Integrating trust to the UTAUT2 framework. *International Journal of Applied Engineering Research*, 12(20), 10258-10268.
- Tamilmani, K., Rana, N. P., Prakasam, N., & Dwivedi, Y. K. (2019). The battle of Brain vs. Heart: A literature review and meta-analysis of "hedonic motivation" use in UTAUT2. *International Journal of Information Management*, 46(January), 222-235.
- Tan Pei Kian, Goh Hang Boon, Stany Wee Lian Fong, & Yeow Jian Ai. (2017). Factors That Influence the Consumer Purchase Intention in Social Media Websites. *International Journal of Supply Chain Management*, 6(4), 208-214. <http://excelingtech.co.uk/>
- Tang, J. C., Venolia, G., & Inkpen, K. M. (2016). Meerkat and Periscope: I Stream, You Stream, Apps Stream for Live Streams. 4770-4780.
- Tarhini, A., Deh, R. M., Al-Busaidi, K. A., Mohammed, A. B., & Maqableh, M. (2017). Factors influencing students' adoption of e-learning: A structural equation modeling approach. *Journal of International Education in Business*, 10(2), 164-182.
- Tee M, Rasli A, Toh JSSK, , Abas IH, Zhou F and Liew CS (2022) A Delphi method on the positive impact of COVID-19 on higher education institutions: Perceptions of academics from Malaysia. *Front. Psychol.* 13:1013974.
- Thong, J. Y. L., Hong, S. J., & Tam, K. Y. (2006). The effects of post-adoption beliefs on the expectation-confirmation model for information technology continuance. *International Journal of Human Computer Studies*, 64(9), 799-810.
- Tong, J. (2017). A Study on the Effect of Web Live Broadcast on Consumers' Willingness to Purchase. *Open Journal of Business and Management*, 05(02), 280-289.

- Turban, E., King, D., Lee, J., & Viehland, D. (2004). *Electronic Commerce: a managerial perspective*. Pearson Education.
- Van Der Heijden, H. (2004). User Acceptance of Hedonic information systems. *Source: MIS Quarterly*, 28(4), 695-704.
- Venkatesh, V., & Bala, H. (2008). Technology acceptance model 3 and a research agenda on interventions. *Decision Sciences*, 39(2), 273-315.
- Venkatesh, V., Morris, M. G., Davis, G. B., & Davis, F. D. (2003). User Acceptance of Information Technology: Toward a Unified View. *MIS Quarterly*, 27(3), 425-478.
- Venkatesh, V., Thong, J. Y. L., & Xu, X. (2012). Consumer acceptance and use of information technology: extending the unified theory of acceptance and use of technology. *MIS Quarterly*, 157-178.
- Wang, Y., & Yu, C. (2017). Social interaction-based consumer decision-making model in social commerce: The role of word of mouth and observational learning. *International Journal of Information Management*, 37(3), 179-189.
- Wang, Z., Lee, S.-J., & Lee, K.-R. (2018). Factors Influencing Product Purchase Intention in Taobao Live Streaming Shopping. *Journal of Digital Contents Society*, 19(4), 649-659.
- 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(November 2017), 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.
- Yang, K. (2010). Determinants of US consumer mobile shopping services adoption: Implications for designing mobile shopping services. *Journal of Consumer Marketing*, 27(3), 262-270.
- Yu, E., Jung, C., Kim, H., & Jung, J. (2018). Impact of Viewer Engagement on Gift-giving in Live Video Streaming. *Telematics and Informatics*, March.
- Yuan, S., Ma, W., Kanthawala, S., & Peng, W. (2015). Keep Using My Health Apps: Discover Users' Perception of Health and Fitness Apps with the UTAUT2 Model. *Telemedicine and E-Health*, 21(9), 735-741.
- Zhang, M., Qin, F., Wang, G. A., & Luo, C. (2020). The impact of live video streaming on online purchase intention. *Service Industries Journal*, 40(9-10), 656-681.