

Trends, Lifestyle, Price Dispersion and E-Tax: Predicting the Behavior of Online Transactions

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Abstract

Information technology brings changes and influences shopping behavior and lifestyle. This study aims to investigate shopping behavior through trends, lifestyles, and price dispersion on decisions to make online transactions. As well as the continued influence of e-tax on the relationship between consumer behavior and online transactions. Data was collected from 279 online shoppers using an online survey. Data analysis using SEM PLS revealed trends as a superior predictor of this relationship, followed by lifestyle, but not in price dispersion and e-tax. The awareness that has emerged about e-tax is evident in this project. These findings will help stakeholders such as online merchants in developing their merchandise to improve marketing and tax policymakers on online platforms. Future frameworks are also discussed in this study.

Key Word: Trends, Lifestyle, Price Dispersion, E-Tax, Online Transactions

1. Introduction

Information technology has played an important role in bringing about change and influencing a person's behavior, not least the shopping behavior and lifestyle of many people (Verma & Jain, 2015; Mahmood, et al. 2004). And on the online transaction application platform, this change is mostly due to quality (Uzun & Poturak, 2014), fashionable (Gonzales, et al. 2021; Ladhari, et al. 2019) products, increased consumption of goods (Tan, et al. 2018), necessities of life (Karine, 2021; Lin, 2019), and prices (Chen, 2020; Koyuncu & Bhattacharya, 2004). In addition, the shift in shopping behavior from traditional to online will continue to increase because the COVID-19 pandemic has not ended for health reasons.

Despite the proliferation of online sellers, there are only a few studies that investigate the factors that influence consumer behavior towards online transactions. Previous studies conducted by Zhang, et al (2007) showed a significant relationship between gender, subjective norms, consumer impulsivity, purchase intention, and actual buying behavior in the online marketing environment. Jamal & Ahmed, (2007) explain consumer adoption behavior towards

the electronic market related to culture and facilities. Huseynov, et al (2019) revealed that consumer behavior in e-commerce platforms is determined by the behavioral characteristics of each consumer segment. However, further investigation on actual behavior due to social phenomena (Baumeister, et al. 2007; 401) in influencing consumer attitudes to want to transact online needs to be studied further. Where Bauman and Bachman (2017) explain that consumers are the center of understanding trust in the online market environment and this increasing trust relationship leads to increased sales (Wang & Fodness, 2010), loyalty (Hong & Cho, 2011; Flavian & Guinalu, 2006), changes in on lifestyle (Alotaibi, et al. 2019; Ahmad, et al. 2010) and habits/trends (Bauman & Bachmann, 2017; Teo & Liu, 2007). Thus, consumer behavior may stem from social changes (lifestyle, trends, and price). In influencing their decisions to transact online.

In addition, there has been no research that has investigated the effect of implementing e-tax policies on the relationship between consumer behavior and online transactions. Electronic commerce taxes on digital application platforms are tax levies and deposits that will be charged to people or entities conducting transactions through e-commerce in Indonesia¹ and currently 51 online platforms are subject to value added tax (VAT)². The demands for the application of electronic tax policies on online transaction platforms are increasingly pressing (Agrawal & Fox, 2017; Ward & Sipior, 2004; Jones & Basu, 2002). On the other hand, tax administration in the e-commerce area has various problems (Zeng et al. 2012; McLure, 2003). Therefore timely research should be carried out to investigate this issue.

This study aims to contribute to the existing literature by investigating the impact of shopping behavior through trends, lifestyles, and price dispersion on online transaction decisions. In addition, this research also investigates business opportunities by online merchants in Indonesia (Sumarliah, et al. 2021; Lestari, 2019) and provides marketing implications for businesses operating in this market. Furthermore, another important contribution of research can be seen in the mediation of e-tax for the relationship between shopping behavior and online transactions. The findings in this study are expected to expand knowledge about online shopping behavior and help tax policymakers on online platforms

¹ Andrea Andrenelli, Javier López González (2019) Electronic transmissions and international trade - shedding new light on the moratorium debate: OECD Trade Policy Paper No 233, OECD Publishing, Paris. Retrieved from <http://dx.doi.org/10.1787/57b50a4b-en>

² Rebecca, A. G. 2021. Policy Brief | Digital Taxation in Indonesia. available at: <https://www.cips-indonesia.org/post/policy-brief-digital-taxation-in-indonesia>

2. The Art Of Research

2.1. The Relationship Between Shopping Trends and Online Transactions

Online electronic consumers generally refer to buyers of goods and services through electronic systems such as the internet and other computer networks (e-commerce & e-money) (Baye, et al. 2004). This group is increasing in number since online shopping has become a trend and lifestyle (Amin & Mohd Nor, 2013). Swinyard & Smith (2003) revealed that the buyers and users of online transactions are young people, rich, educated, internet literate, and spend a lot of time on computers and the internet. Several previous studies explain the many positive things that online consumers like about online transactions, such as convenience (Shen, et al. 2020), flexibility (Grob & Sohn, 2021), and time intensity (Song, et al. 2020). And online shopping consumers have experienced a significant increase due to restrictions on human mobility and the COVID-19 pandemic (Jensen, et al. 2020; Bhatti, et al. 2020; Kim, 2020). Although several other kinds of literature have examined the relationship between shopping behavior and online transactions, for example, transaction costs (Teo, et al. 2004), trust (Chen & Barnes, 2007), and functions and characteristics (Mallapragada, et al. 2016). However, Babar et al (2014) explained that online shopping will only be accepted as a trending behavior when the bond of trust is emphasized by the seller and this bond is getting stronger accompanied by accurate information (Marriott, et al. 2017), easy and safe (Chawla & Kumar, 2021), and offering the latest fashion trends (Ladhari, et al. 2019). So we speculate that trending behavior affects online transactions and this study argues:

H1: Online shopping trends are positively related to online transactions

2.2. Relationship Lifestyle and Online Transactions

Blackwell, et al (in Ji & Lee, 2004) showed that consumer lifestyles reflect daily activities, interests, opinions, and are significantly related to their demographic characteristics. Chanaron (2013) describes e-lifestyle as one of three types of innovative lifestyles that have emerged due to technological and organizational innovations. Furthermore, Swinyard & Smith (2003) explained that the shift in the instruments of life between the past and the present has an effect on a person's lifestyle. In recent years, lifestyle changes due to economic motivation on online platforms have continued to develop (Blitstein, et al. 2020; Padmavathy, et al. 2019), although other findings have explained the influence of lifestyle on online transactions (Yang, et al. 2021; Ahmad, et al. 2010), however, as explained by Blackwell, that differences in the use of platforms, technology and reach have different values on a person's lifestyle. In addition, online

technology innovation continues to grow and is in line with changes in consumer and market behavior (Sundbo, 1998), so this study speculates that:

H2: Lifestyle positively affects online transactions

2.3. The Effect of Price Dispersion on Online Transactions

Price dispersion is an insight into market conditions that generate potential price discrimination strategies (Ba, et al. 2012). There are two different perspectives on this price dispersion, namely: the supply and demand perspective (Granados, et al. 2012). Supply is related to price posting and demand is related to the price consumers pay (Baye et al. 2006). Although investigations on price perception and online transactions have been previously reviewed (Wang & Li, 2020; Zhuang, et al. 2018; Ghose & Yaou, 2011), however, as Zhao et al. (2015) found, the different perspectives taken on online prices yielded results different for each dispersion and we tested on the perspective of offering by online transaction platforms. We also speculate that online sellers often make price changes randomly and make it difficult for consumers to respond appropriately (Oh & Lucas, 2006), so this study argues that:

H3: The price dispersion listed by the application has a positive effect on online transaction decisions

2.4. E-tax as a Mediator of Consumer Behavior and Online Transactions

There are serious challenges currently being faced by Indonesia and several other countries in the world in determining value-added tax (VAT) policies on digital-based electronic commerce (Polezharova & Krasnobaeva, 2020; Hamid, et al. 2019; Simon, 2004). This study determines whether electronic tax policy can strengthen the relationship between consumer behavior and their desire to conduct online transactions (Agrawal & Fox, 2017). Although debates arise on e-tax policy preferences in e-commerce such as high tax rates by application (Tosun & Skidmore, 2007), tax qualifications & nature of transactions (Scarcella, 2020), provisions on taxable goods (Jin, 2003). However, Zodrow (2006) explains that taxes by e-commerce can incur relatively large administrative costs on market demand and low tax policies are preferred by buyers and sellers. Furthermore, Zodrow (2006) said that consumers prefer uniform tax collections, including on online application platforms. Zhou, et al. (2018) explain that product information on online platforms (including taxes) helps consumers understand product prices correctly and shopping behavior in line with tax provisions (Baker, et al. 2021; Zhang & Choi, 2021). Therefore, this study argues that e-tax may be a moderator of the relationship between shopping behavior and online transactions:

H4: E-taxes has a direct effect on the behavior of shopping trends and online transactions

H5: E-taxes have a direct effect on the relationship between lifestyle and online transactions

H6: E-taxes have a direct effect on the relationship between price dispersion and online transactions

3. Procedure

3.1. Procedure and Subject

We used an online survey with a questionnaire on the google form to obtain information on this research and the questionnaire link was shared via email, what app, Facebook message, and telegram app. The construction proposed in the questionnaire begins with the personal profile of the respondent such as gender, age, job level and continues with questions about the subject's involvement with online transactions (OT), such as: "Are you subscribing to a certain OT, the purpose of using OT, how many OT applications are used? , and long subscription OT. Next, the subject will answer questions about shopping trends, lifestyle, price dispersion, e-tax, and online transactions. The sample in this study was random and no specific criteria were applied to select the sample in this study. Each sample was told that this participation is voluntary and they can leave at any time if they feel uncomfortable with the survey. And as an appreciation from the research team, a free coupon that can be exchanged for a cup of coffee at the designated outlet will be offered to them at the end of the survey. . In total there were 301 survey data entered, but only 279 answers were completed and all data were considered valid. Confirmed online transaction applications that are widely used by subjects are Shope, Blibli, Tokopedia, Facebook, Bukalapak, Lazada, Grab, and Gojek. Furthermore, the purpose of using the application is for shopping, paying bills, transferring money, ordering tickets, ordering online applications. Table 1 shows the demographic profile and the relationship of the subject with OT, namely:

Gender	Percentage %	Subscribe OT	Percentage %
Male	30.8	One app	18.3
Female	69.2	Two app	25.4
Age		> 3 app	56,3
7-20	8,6	App Subscription Length	
21-35	45.5	1 Years	8.2
36-50	32.3	2 Years	17.3
50 >	13.6	More 2 Years	74.5
Job Level			
School	24.7		
Work	67.8		
Not Working	7.5		

3.2. Research Instruments

The constructs used to measure the relationship of each variable in this study are online shopping trends, lifestyle, price dispersion, e-tax, and online transactions (see Appendix A). The initial construct of individual behavior towards online transactions, through online shopping trend variables, is 4 questions, lifestyle is 4 questions and price dispersion is 4 questions, and questions about online transactions are 4 questions. Furthermore, questions about mediation from e-tax amounted to 5 questions. Each item is measured using a Linkert attitude scale and starts with 5 which is associated with “always” and 1 is interpreted as “never. The process of validity on each instrument and panel used refers to the literature and the current experience of researchers.

4. Result

Data analysis using PLS-SEM is recommended for normal data and has a few limited assumptions about the data (Hair, et al. 2019). To support a strong estimation value, the minimum sample size requirement must be equal to 10 times the number of structural paths proposed in the latent construction (Hair, et al. 2014). With a sample size of two hundred and seventy-nine, it is sufficient for the PLS-SEM.

4.1. Measurement Model Results

Looking at the results of the CFA to validate dimensions and items at a factor loading value lower than 0.7 (Kim, 2007). Deleting these items is done to ensure that there is a close relationship between the items being measured and showing appropriate constructs (Fornel & Larcker, 1981). Table 2 shows the modified value of the measurement results of the model indicators. In detail, the values of the latent variables that did not match were removed and were not continued for the next stage of analysis, namely: PD (1, 3), and ET 5. Cronbach's alpha value (α) and composite reliability (CR) showed numbers > 0.7 , whose results indicate the reliability of the corresponding load values (Garthwaite, 1994). In addition, the average value of the extracted variance (AVE) is > 0.5 and the convergent validity is confirmed.

Path	Loadings	Reliability & validity
TS → TS1	.735	AVE = .557
TS → TS2	.720	CR = .835
TS → TS3	.753	$\alpha = .741$
TS → TS4	.776	
LS → LS1	.775	AVE = .608
LS → LS2	.786	CR = .861
LS → LS3	.803	$\alpha = .768$
LS → LS4	.753	
PD → PD2	.959	AVE = .561
PD → PD4	.927	CR = .822

		$\alpha = .715$
ET → ET1	.870	AVE = .512
ET → ET2	.895	CR = .759
ET → ET3	.779	$\alpha = .705$
ET → ET4	.797	
OT → OT1	.765	AVE = .617
OT → OT2	.875	CR = .865
OT → OT3	.786	$\alpha = .791$
OT → OT4	.706	

The discriminant validity provisions were evaluated by looking at the value of the Fornell & Larcker test and the heterotrait monotrait ratio (HTMT) of the threshold value. Fornell and Larcker test values as shown in table 3 between each pair of latent variable constructs were found to be lower than the associated AVE (Fornell & Larcker, 1981). In addition, the HTMT ratio criterion value obtained was below the recommended threshold of 0.85 (Kline, 2015) and this shows that the discriminant validity in this study is fulfilled.

Table 3. Discriminant validity: Fornell-Larcker (below the main diagonal) and Heterotrait-Monotrait Ratio (HTMT) (above the main diagonal)

	TS	LS	PD	ET	OT
TS	.746	.234	.089	.040	.344
LS	.284	.780	.100	-.106	.347
PD	.089	.072	.749	-.136	.103
ET	.040	.148	.180	.688	.155
TO	.344	.284	.103	-.040	.785

4.2. Testing Model Relationships and Hypotheses

As shown in Table 4 and Figure 1, the results show that there is a significant relationship between TS and OT ($\beta = 0.294$, $t = 4.706$, < 0.000) and LS with OT ($\beta = 0.207$, $t = 3.138$, < 0.002), but not with PD to OT ($\beta = 0.053$, $t = 0.686$, < 0.489) whose results were found to be insignificant. Furthermore, the results of R Squared can be used to clarify the relationship between the constructs of the research model and the value indicated has a value of more than 0.10 (Falk and Miller, 1992).

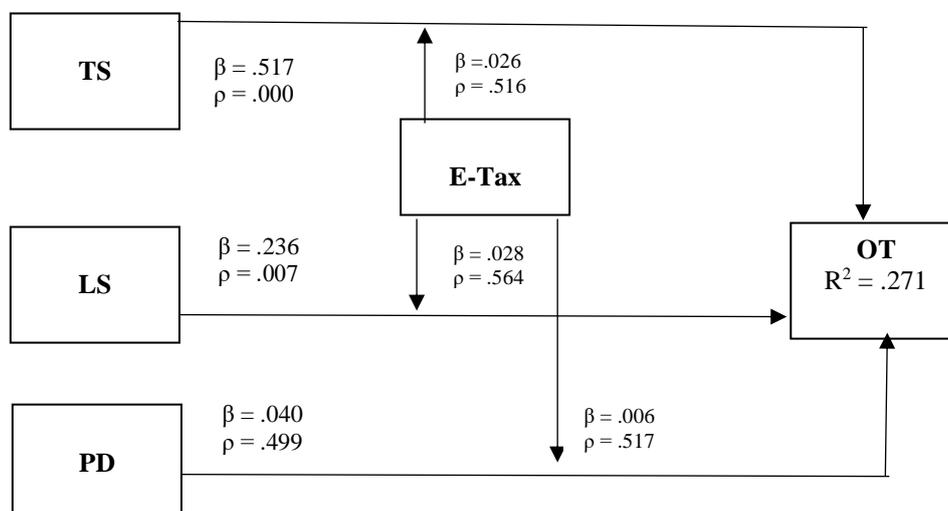


Figure 1. The estimated results of the model testing

More about the indirect effect as in table 5 and figure 1 which shows that e-tax (ET) has an insignificant effect on all construction variables, such as: TS through ET to OT ($\beta = 0.026$, $t = 0.516$, $\rho < 0.606$), then LS through ET to OT ($\beta = 0.028$, $t = 0.578$, $\rho < 0.564$) and PD through ET to OT ($\beta = 0.006$, $t = 0.684$, $\rho < 0.517$). Finally, table 6 shows all the results of hypothesis testing, there are two relationships that support the hypothesis and the other four have different values.

Hypothesis	Path From	Path To	Path Coefficient	Significance	t-value	Hypothesis test
H ₁	TS	OT	.294	.000	4.706	Supported
H ₂	LS	OT	.207	.002	3.138	Supported
H ₃	PD	OT	.053	.489	.686	Not Supported

The test results from the bootstrap procedure to determine the causal relationship between the construct variables by looking at the path coefficient results and the t value (Gefen et al., 2000) show that there are two formative constructs that have significant values, namely: the construction path between shopping trends and online transactions (H1) has a significant value ($\beta = 0.294$, $t = 4.706$, $\rho < 0.000$) and the lifestyle path towards online transactions (H2) also has a significant value ($\beta = 0.207$, $t = 3.138$, $\rho < 0.002$). However, for other constructs, namely: price dispersion on online transactions (H3) does not significantly affect ($\beta = 0.053$, $t = 0.686$, $\rho < 0.489$) and for a possible explanation of the relationship between these variables, online shoppers in Indonesia do not consider the information important. about the difference in the price of goods and variations in the price of each item displayed by the application to influence its decision in conducting online transactions so that the profits that should be obtained from the difference in the price difference are not decisive.

Interaction	Coefficient	Significance	t-value	Effect
TS → ET → TO	.026	.606	.516	Small
LS → ET → TO	.028	.564	.578	Small
PD → ET → TO	.006	.517	.648	Small

The results of R² as presented in Figure 1 regarding the relationship between shopping behavior (trend, lifestyle, and price dispersion) contributed 27.1% to online transactions. Furthermore, the provisions regarding the size of the interaction effect are considered small if 0.02, moderate if 0.15, and large if 0.35 (Cohen, et al. 2013), and the mediating effect of e-tax has a small and indirect effect on the shopping behavior relationship and online transaction.

Hypothesis	Result
H ₁ Online shopping trends are positively related to online transactions	Supported

H ₂	Lifestyle positively affects online transactions	Supported
H ₃	The price dispersion listed by the application has a positive effect on online transaction decisions	Not Supported
H ₄	E-taxes has a direct effect on the behavior of shopping trends and online transactions	Not Supported
H ₅	E-taxes have a direct effect on the relationship between lifestyle and online transactions	Not Supported
H ₆	E-taxes have a direct effect on the relationship between price dispersion and online transactions	Not Supported

5. Discussion

5.1. Findings

There are some interesting findings from this study, such as online shopping trends and lifestyle being significant predictors of online transactions. Supporting previous findings, regarding online shopping trends that can provide trust and convenience when shopping for consumers ([Gabriel & Ogbuigwe, 2016](#)), online shopping trends in this study also show the same influence, the contribution of trust may be seen in product quality that is considered good by consumers. consumers and information about products that are quite accurate. In addition, convenience when shopping is seen in the large number of diverse and fashionable product choices that strongly support consumers' decisions to make online transactions. The development of online shopping trends may arise due to the disclosure of information about the latest products provided by online applications, thus influencing consumers' decisions to make online transactions. Furthermore, lifestyle has a significant effect on online transactions. [Pandey, et al \(2014\)](#) explain that online shoppers find online shopping easier and more entertaining. And this study supports these findings, where lifestyle behavior in online transactions found in the OT application is considered very interesting, a lot of information and promos are provided, supports activities and activities of daily living, helps their social life. These results explain that the existence of online transaction applications may have been well received by online shoppers and can support their daily activities such as shopping, paying bills, money transfers, booking tickets, and ordering online applications.

Price dispersion was not found to have an effect on online transactions and this finding is in line with the results of [Ghoze and Yao, \(2010\)](#) who explained that in some internet markets the "law of one price" may apply when consumers consider the transaction price, not the price posted by the application. In the context of this research, online shoppers do not consider important the information they get about the difference in the price of goods and the price variations of each item displayed by the application in influencing their decision to transact online.

Although there is the awareness that arises from online shoppers about e-tax policies such as: accepting tax breaks, supporting e-tax, application platforms that provide convenience in paying taxes, and tax compliance, [Jin \(2003\)](#) explains that although online sales are growing rapidly and are receiving wide attention from the public, there was little positive impact found on the collection of online sales taxes and their use by consumers. And this finding explains that the e-tax variable is not a good mediation of the relationship between shopping behavior and online transactions because it shows a very small value and does not have a direct effect on this relationship. The Indonesian government needs to think about alternative policies in determining e-tax on online transaction application platforms that have been circulating among the public so far.

5.2. Practical Implications

Contributions to research are expected to help academics, managers, and online store owners, as well as the government in determining strategic steps to support online shopping and transaction platforms. First, online shopping trends can influence online transaction decisions and the trend's contribution is seen in product quality, product information, and various product choices according to trends in society. Second, lifestyle positively affects online transactions. Online consumers really like online transaction applications because they are attractive and offer information and promos for necessities, support social activities, and the needs of their daily life. Third, online store managers and owners need to think about attractive steps and strategies to encourage the growth and development of their online stores through the results of this research. Fourth, although e-tax does not match the expectations in this study, the emergence of awareness from online shoppers about the existence of e-tax is expected to encourage and provide a foundation for the Indonesian government to make alternative e-sales tax policies that are suitable for online shopping and transaction application platforms.

5.3. Future Research and Limitations

Every study has limitations and this study is no exception. First, the investigation in this research contextually and specifically examines consumer shopping behavior with online transaction applications in Indonesia. These findings may not apply to other market segments, different application technology platforms, and different locations. Thus, it is possible to replicate this study in other places and locations. Second, direct contact with the subject was neglected in this study because the survey was distributed online, so there is a possibility of misperception in collecting information.

There are several proposed future research frameworks from the results of this study, namely: First, the initial construction of the questionnaire explains that each user of the online transaction application has a certain background (age, gender, job level), the purpose of use, and personal preference in his choice of the application. Examining more about consumer characteristics, user motivation, and personal preferences are important in knowing consumer behavior and decisions to make online transactions. Second, further analysis of the relationship between trends and lifestyles on online transactions can be developed further by examining the driving factors. Third, online shoppers may recognize the existence of e-tax in online applications, but the impact is not significant on the decision to make online transactions. It is necessary to examine more deeply the driving factors so that the objectives and implementation of this e-tax policy can be interpreted properly by consumers, online merchants, and policymakers.

6. Conclusion

This study reveals the latent influence of trends and lifestyles on consumer shopping behavior through online transactions. Although the study results do not apply to price dispersion, the evidence in this project can provide a reference for traders in the online market to develop marketing strategies in the online market. In addition, other findings on the awareness that arise in the e-tax provisions that apply to online platforms can assist policymakers in developing appropriate electronic tax alternatives.

7. Appendix & Scale Item

Items	Question (Likert Scale)
Trends - Häubl & Trifts (2000)	
OST 1	Product information advertising is very interesting, accurate and complete
OST 2	Offers branded products, and attracts attention for shopping
OST 3	The products offered are always fashionable, and trendy
OST 4	The quality of the goods offered is very good and up-to-date
Lifestyle - Swinyard & Smith (2003)	
LS1	OT is closely related to the user's daily activities
LS 2	I like OT because of new promos, discounts and information
LS 3	OT application is very interesting to use every day
LS 4	Help the user's social life (social activities)
Price Dispersion - Pan, et al (2004)	
PD 1	Random pricing strategy is very helpful when shopping
PD 2	Prices offered are in accordance with traditional markets
PD 3	The uniqueness of the products offered affects the desire to shop
PD 4	The variety of prices offered is very helpful for shopping decisions
E-tax- Night & Bananuka (2019)	
e-tax 1	I have positive feelings for the e-tax system on the online application
e-tax 2	The e-tax system in online shopping makes it easy for us to comply with taxes
e-tax 3	The e-tax system implemented by the OT application is convenient and fast
e-tax 4	I feel better with e-tax because I have paid taxes
e-tax 5	The e-tax system is safe, and convenient to use when transacting online
Online Transaction (OT) - Cho, 2004	
OT 1	I enjoy shopping and browsing through online shopping malls
OT 2	Online shopping center is a favorite place to shop
OT 3	I don't mind spending time browsing online shopping malls
OT 4	I enjoy every moment while shopping online.

8. References

- Agrawal, D.R., Fox, W.F. Taxes in an e-commerce generation. *Int Tax Public Finance* 24, 903–926 (2017). <https://doi.org/10.1007/s10797-016-9422-3>.
- Ahmad, N., Omar, A. and Ramayah, T. (2010), "Consumer lifestyles and online shopping continuance intention", *Business Strategy Series*, Vol. 11 No. 4, pp. 227-243. <https://doi.org/10.1108/17515631011063767>.
- Alotaibi, T. S., Alkhatlan, A. A., & Alzeer, S. S. (2019). Instagram shopping in Saudi Arabia: what influences consumer trust and purchase decisions. *International Journal of Advanced Computer Science and Applications*, 10(11).
- Amin, N., & Mohd Nor, R. (2013). Online shopping in Malaysia: Legal Protection for E-consumers. *European Journal of Business and Management*, 5(24), 79-86.
- Ba, S., Stallaert, J., & Zhang, Z. (2012). Research note—online price dispersion: A game-theoretic perspective and empirical evidence. *Information Systems Research*, 23(2), 575-592. <https://doi.org/10.1287/isre.1110.0353>.
- Babar, A., Rasheed, A., & Sajjad, M. (2014). Factors influencing online shopping behavior of consumers. *Journal of Basic and Applied Scientific Research*, 4(4), 314-320.

- Baker, S. R., Johnson, S., & Kueng, L. (2021). Shopping for lower sales tax rates. *American Economic Journal: Macroeconomics*, 13(3), 209-50. <https://doi.org/10.1257/mac.20190026>.
- Bauman, A., & Bachmann, R. (2017). Online consumer trust: Trends in research. *Journal of technology management & innovation*, 12(2), 68-79.
- Baumeister, R. F., Vohs, K. D., & Funder, D. C. (2007). Psychology as the science of self-reports and finger movements: Whatever happened to actual behavior?. *Perspectives on psychological science*, 2(4), 396-403. <https://doi.org/10.1111/j.1745-6916.2007.00051.x>.
- Baye, M. R., Morgan, J., Scholten, P., & Jansen, D. (2006). Persistent price dispersion in online markets. *The New Economy & Beyond: Past Present and Future*, Edward Elgar, S, 122-143.
- Baye, M. R., Morgan, J., & Scholten, P. (2004). Temporal price dispersion: Evidence from an online consumer electronics market. *Journal of Interactive Marketing*, 18(4), 101-115. <https://doi.org/10.1002/dir.20016>.
- Bhatti, A., Akram, H., Basit, H. M., Khan, A. U., Raza, S. M., & Naqvi, M. B. (2020). E-commerce trends during COVID-19 Pandemic. *International Journal of Future Generation Communication and Networking*, 13(2), 1449-1452.
- Blitstein, J. L., Frenz, F., & Jilcott Pitts, S. B. (2020). A mixed-method examination of reported benefits of online grocery shopping in the United States and Germany: Is health a factor?. *Journal of Food Products Marketing*, 26(3), 212-224. <https://doi.org/10.1080/10454446.2020.1754313>.
- Chanaron, J.J., 2013. Innovative lifestyle: towards the life of future- an exploratory essay. *Megatrend Rev.* 10 (1), 63–82.
- Chawla, N., & Kumar, B. (2021). E-commerce and consumer protection in India: The emerging trend. *Journal of Business Ethics*, 1-24. <https://doi.org/10.1007/s10551-021-04884-3>.
- Chen, C., & Li, X. (2020). The effect of online shopping festival promotion strategies on consumer participation intention. *Industrial Management & Data Systems*. Vol. 120 No. 12, pp. 2375-2395. <https://doi.org/10.1108/IMDS-11-2019-0628>.
- Chen, Y. and Barnes, S. (2007), "Initial trust and online buyer behaviour", *Industrial Management & Data Systems*, Vol. 107 No. 1, pp. 21-36. <https://doi.org/10.1108/02635570710719034>.
- Cho, J. (2004). Likelihood to abort an online transaction: influences from cognitive evaluations, attitudes, and behavioral variables. *Information & Management*, 41(7), 827–838. <https://doi:10.1016/j.im.2003.08.013>.

- Cohen, P., West, S. G., & Aiken, L. S. (2014). Applied multiple regression/correlation analysis for the behavioral sciences. Psychology press.
- Falk, R. F., & Miller, N. B. (1992). A primer for soft modeling. University of Akron Press.
- Flavián, C. and Guinalú, M. (2006), "Consumer trust, perceived security and privacy policy: Three basic elements of loyalty to a web site", *Industrial Management & Data Systems*, Vol. 106 No. 5, pp. 601-620. <https://doi.org/10.1108/02635570610666403>.
- Fornell, C., & Larcker, D. F. (1981). Evaluating structural equation models with unobservable variables and measurement error. *Journal of Marketing Research*, 18(1), 39–50.
- Gabriel, J. M. O., Ogbuigwe, T. D., & Ahiauzu, L. U. (2016). Online shopping systems in Nigeria: Evolution, trend and prospects. *Asian Research Journal of Arts & Social Sciences*, 1(4), 182-276.
- Garthwaite, Paul H., (1994). An Interpretation of Partial Least Squares, *Journal of the American Statistical Association*, 89:425, 122-127, <https://doi.org/10.1080/01621459.1994.10476452>
- Gefen, D., Straub, D., & Boudreau, M. C. (2000). Structural equation modeling and regression: Guidelines for research practice. *Communications of the association for information systems*, 4(1), 7. <https://doi.org/10.17705/1CAIS.00407>
- Ghose, A., & Yao, Y. (2011). Using transaction prices to re-examine price dispersion in electronic markets. *Information Systems Research*, 22(2), 269-288.
- González, E. M., Meyer, J. H., & Toldos, M. P. (2021). What women want? How contextual product displays influence women's online shopping behavior. *Journal of Business Research*, 123, 625-641. <https://doi.org/10.1016/j.jbusres.2020.10.002>.
- Groß, M., & Sohn, S. (2021). Understanding the consumer acceptance of mobile shopping: the role of consumer shopping orientations and mobile shopping touchpoints. *The International Review of Retail, Distribution and Consumer Research*, 31(1), 36-58. <https://doi.org/10.1080/09593969.2020.1852096>.
- Hair, J. F., Black, W. C., Babin, B. J., & Anderson, R. E. (2014). *Multivariate data analysis* (8th ed.). New Jersey, NJ: Pearson Education.
- Hair, J. F., Risher, J. J., Sarstedt, M., & Ringle, C. M. (2019). When to use and how to report the results of PLS-SEM. *European business review*. <https://doi.org/10.1108/EBR-11-2018-0203>.
- Hamid, A. N., Ibrahim, N. A., Ibrahim, N. A., Ariffin, N., Taharin, R., & Jelani, F. A. (2019). Factors affecting tax compliance among Malaysian SMEs in e-commerce business.

- International Journal of Asian Social Science, 9(1), 74-85.
<https://doi.org/10.18488/journal.1.2019.91.74.85>.
- Häubl, G., & Trifts, V. (2000). Consumer decision making in online shopping environments: The effects of interactive decision aids. *Transaksiing science*, 19(1), 4-21.
- Hong, I. B., & Cho, H. (2011). The impact of consumer trust on attitudinal loyalty and purchase intentions in B2C e-marketplaces: Intermediary trust vs. seller trust. *International journal of information management*, 31(5), 469-479. <https://doi.org/10.1016/j.ijinfomgt.2011.02.001>.
- Huseynov, F., & Özkan Yıldırım, S. (2019). Online consumer typologies and their shopping behaviors in B2C e-commerce platforms. *Sage Open*, 9(2), 2158244019854639. <https://doi.org/10.1177/2158244019854639>.
- Jamal, A. S., & Ahmed, A. F. (2007, July). Socio-cultural factors influencing consumer adoption of online transactions. In *Eighth World Congress on the Management of eBusiness (WCMeB 2007)* (pp. 5-5). IEEE. <https://doi.org/10.1109/WCMEB.2007.60>.
- Jensen, K. L., Yenerall, J., Chen, X., & Yu, T. E. (2021). US Consumers' Online Shopping Behaviors and Intentions During and After the COVID-19 Pandemic. *Journal of Agricultural and Applied Economics*, 53(3), 416-434. <https://doi.org/10.1017/aae.2021.15>.
- Jih, W. J. K., & Lee, S. F. (2004). An exploratory analysis of relationships between cellular phone uses' shopping motivators and lifestyle indicators. *Journal of Computer Information Systems*, 44(2), 65-73. <https://doi.org/10.1080/08874417.2004.11647568>.
- Jin, D. Y. (2003). E-tax or e-commerce: The debate on taxing electronic commerce transactions. *Journal of Internet Commerce*, 2(1), 65-87.
- Jones, R., & Basu, S. (2002). Taxation of electronic commerce: A developing problem. *International Review of Law, Computers & Technology*, 16(1), 35-51. <https://doi.org/10.1080/13600860220136093>.
- Karine, H. A. J. I. (2021). E-commerce development in rural and remote areas of BRICS countries. *Journal of Integrative Agriculture*, 20(4), 979-997. [https://doi.org/10.1016/S2095-3119\(20\)63451-7](https://doi.org/10.1016/S2095-3119(20)63451-7).
- Kim, G. S. (2007). The service recovery strategies, customer satisfaction, customer loyalty. *Asian Journal on Quality*. <https://doi.org/10.1108/15982688200700005>.
- Kim, R. Y. (2020). The impact of COVID-19 on consumers: Preparing for digital sales. *IEEE Engineering Management Review*, 48(3), 212-218. <https://doi.org/10.1109/EMR.2020.2990115>.

- Kim, Y. K., & Sullivan, P. (2019). Emotional branding speaks to consumers' heart: The case of fashion brands. *Fashion and Textiles*, 6(1), 1-16. <https://doi.org/10.1186/s40691-018-0164-y>.
- Kline, R. B. (2015). *Principles and practice of structural equation modeling*. New York: Guilford.
- Koyuncu, C., & Bhattacharya, G. (2004). The impacts of quickness, price, payment risk, and delivery issues on on-line shopping. *The Journal of Socio-Economics*, 33(2), 241-251. <https://doi.org/10.1016/j.socec.2003.12.011>.
- Ladhari, R., Gonthier, J., & Lajante, M. (2019). Generation Y and online fashion shopping: Orientations and profiles. *Journal of Retailing and Consumer Services*, 48, 113-121. <https://doi.org/10.1016/j.jretconser.2019.02.003>.
- Lestari, D. (2019). Measuring e-commerce adoption behaviour among gen-Z in Jakarta, Indonesia. *Economic Analysis and Policy*, 64, 103-115. <https://doi.org/10.1016/j.eap.2019.08.004>.
- Lin, Y. (2019). E-urbanism: E-commerce, migration, and the transformation of Taobao villages in urban China. *Cities*, 91, 202-212. <https://doi.org/10.1016/j.cities.2018.11.020>.
- Mahmood, M. A., Bagchi, K., & Ford, T. C. (2004). On-line shopping behavior: Cross-country empirical research. *International Journal of Electronic Commerce*, 9(1), 9-30. <https://doi.org/10.1080/10864415.2004.11044321>.
- Mallapragada, G., Chandukala, S. R., & Liu, Q. (2016). Exploring the Effects of “What” (Product) and “Where” (Website) Characteristics on Online Shopping Behavior. *Journal of Marketing*, 80(2), 21–38. <https://doi.org/10.1509/jm.15.0138>.
- Marriott, H. R., Williams, M. D., & Dwivedi, Y. K. (2017). What do we know about consumer m-shopping behaviour?. *International Journal of Retail & Distribution Management*. 46(6). pp. 568-586. <https://doi.org/10.1108/IJRDM-09-2016-0164>.
- McKenzie. B. (2019). Indonesia: New Regulation on Electronic System and Transactions. Retrieved from: <https://www.bakermckenzie.com/en/insight/publications/2019/10/new-regulation-electronic-system-and-transactions>.
- McLure, C. E. (2003). The value added tax on electronic commerce in the European Union. *International Tax and Public Finance*, 10(6), 753-762. <https://doi.org/10.1023/A:1026394207651>.
- Night, S., & Bananuka, J. (2019). The mediating role of adoption of an electronic tax system in the relationship between attitude towards electronic tax system and tax compliance.

- Journal of Economics, Finance and Administrative Science. 25 (49). 73-88.
<https://doi.org/10.1108/JEFAS-07-2018-0066>.
- Oh, W., & Lucas Jr, H. C. (2006). Information technology and pricing decisions: Price adjustments in online computer markets. *MIS quarterly*, 30 (3). 755-775.
<https://doi.org/10.2307/25148748>.
- Padmavathy, C., Swapana, M., & Paul, J. (2019). Online second-hand shopping motivation—Conceptualization, scale development, and validation. *Journal of Retailing and Consumer Services*, 51, 19-32.
- Pan, X., Ratchford, B. T., & Shankar, V. (2004). Price dispersion on the internet: A review and directions for future research. *Journal of Interactive Marketing*, 18(4), 116–135.
<https://doi.org/10.1002/dir.20019>.
- Pandey, S., & Chawla, D. (2014). E-lifestyles of Indian online shoppers: A scale validation. *Journal of Retailing and Consumer Services*, 21(6), 1068–1074.
<https://doi.org/10.1016/j.jretconser.2014.06>.
- Polezharova, L. V., & Krasnobaeva, A. M. (2020). E-Commerce Taxation in Russia: Problems and Approaches. *Journal of Tax Reform*, 6(2), 104-123.
<https://doi.org/10.15826/jtr.2020.6.2.077>.
- Scarcella, L. (2020). E-commerce and effective VAT/GST enforcement: Can online platforms play a valuable role?. *Computer law & security review*, 36, 105371.
<https://doi.org/10.1016/j.clsr.2019.105371>.
- Shen, L., He, Y., Li, Lh. et al. Impacts of online shopping convenience and physical retail proximity on housing prices in Shenzhen, 2016–2018. *J Hous and the Built Environ* 35, 1157–1176 (2020). <https://doi.org/10.1007/s10901-020-09732-w>.
- Simon, S. J. (2004). Critical success factors for electronic services: Challenges for developing countries. *Journal of Global Information Technology Management*, 7(2), 31-53.
<https://doi.org/10.1080/1097198X.2004.10856371>.
- Song, P., Wang, Q., Liu, H., & Li, Q. (2020). The value of buy-online-and-pickup-in-store in omni-channel: evidence from customer usage data. *Production and Operations Management*, 29(4), 995-1010. <https://doi.org/10.1111/poms.13146>.
- Sumarliah, E., Usmanova, K., Mousa, K., & Indriya, I. (2021). E-commerce in the fashion business: the roles of the COVID-19 situational factors, hedonic and utilitarian motives on consumers' intention to purchase online. *International Journal of Fashion Design, Technology and Education*, 1-11. <https://doi.org/10.1080/17543266.2021.1958926>.

- Sundbo, J. (1998). *The theory of innovation: entrepreneurs, technology and strategy*. Edward Elgar Publishing.
- Swinyard, W. R., & Smith, S. M. (2003). Why people (don't) shop online: A lifestyle study of the internet consumer. *Psychology & marketing*, 20(7), 567-597. <https://doi.org/10.1002/mar.10087>.
- Tan, G. W. H., & Ooi, K. B. (2018). Gender and age: Do they really moderate mobile tourism shopping behavior?. *Telematics and Informatics*, 35(6), 1617-1642. <https://doi.org/10.1016/j.tele.2018.04.009>.
- Teo, T. S., Wang, P., & Leong, C. H. (2004). Understanding online shopping behaviour using a transaction cost economics approach. *International Journal of Internet Marketing and Advertising*, 1(1), 62-84.
- Teo, T. S., & Liu, J. (2007). Consumer trust in e-commerce in the United States, Singapore and China. *Omega*, 35(1), 22-38.
- Tosun, M. S., & Skidmore, M. L. (2007). Cross-border shopping and the sales tax: An examination of food purchases in West Virginia. *The B.E. Journal of Economic Analysis & Policy*, 7(1), 1-18.
- Verma, P., & Jain, S. (2015). Skills augmenting online shopping behavior: A study of need for cognition positive segment. *Business Perspectives and Research*, 3(2), 126-145. <https://doi.org/10.1177/2278533715578556>.
- Wang, L. C., & Fodness, D. (2010). Can avatars enhance consumer trust and emotion in online retail sales?. *International Journal of Electronic Marketing and Retailing*, 3(4), 341-362.
- Wang, W., & Li, F. (2020). What determines online transaction price dispersion? Evidence from the largest online platform in China. *Electronic Commerce Research and Applications*, 42, 100968. <https://doi.org/10.1016/j.elerap.2020.100968>.
- Ward, B. T., & Sipior, J. C. (2004). To tax or not to tax e-commerce: A United States perspective. *Journal of Electronic Commerce Research*, 5(3), 172-180.
- Yang, M., Mamun, A. A., Mohiuddin, M., Nawi, N. C., & Zainol, N. R. (2021). Cashless transactions: A study on intention and adoption of e-wallets. *Sustainability*, 13(2), 831. <https://doi.org/10.3390/su13020831>.
- Zhang, T., & Choi, T. M. (2021). Optimal consumer sales tax policies for online-offline retail operations with consumer returns. *Naval Research Logistics (NRL)*, 68(6), 701-720. <https://doi.org/10.1002/nav.21935>.

- Zhang, X., Prybutok, V. R., & Strutton, D. (2007). Modeling influences on impulse purchasing behaviors during online marketing transactions. *Journal of Marketing Theory and Practice*, 15(1), 79-89. <https://doi.org/10.2753/MTP1069-6679150106>.
- Zeng, Y., Guo, X., & Huang, H. (2012). E-commerce tax collection and administration in China. In 2012 International Conference on Information Management, Innovation Management and Industrial Engineering. Vol. 3, pp. 424-427). <https://doi.org/10.1109/ICIII.2012.6340008>.
- Zhou, L., Wang, W., Xu, J. D., Liu, T., & Gu, J. (2018). Perceived information transparency in B2C e-commerce: An empirical investigation. *Information & Management*, 55(7), 912-927. <https://doi.org/10.1016/j.im.2018.04.005>.
- Zhuang, H., Leszczyc, P. T. P., & Lin, Y. (2018). Why is price dispersion higher online than offline? The impact of retailer type and shopping risk on price dispersion. *Journal of Retailing*, 94(2), 136-153. <https://doi.org/10.1016/j.jretai.2018.01.003>.