

From Brick-and-Mortar Stores to E-Commerce: Assessing the Determinants of E-Commerce Adoption

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Abstract

The increased use of computers and Internet access speed has brought about a new form of sales and purchases. E-Commerce has become a rapidly developing phenomenon. Many studies have been carried out to understand the trend, but there still needs to be more research on the involvement of students in E-Commerce. This study was carried out to review the current level of involvement of Malaysian undergraduate students as traders in the use of E-Commerce and to examine the influence of performance expectancy, perceived trust, and facilitating conditions towards the adoption of E-Commerce. The conceptual model proposed was based on the extended Theory of Technology Acceptance Model (TAM). This was further extended by adding facilitating conditions as an enabler factor. A total of 384 respondents were selected using random sampling. Descriptive, correlational, and regression analysis were used to analyse the study's findings. This study found that, in general, the use of E-Commerce among students is high, which shows that many students choose to find side income through online business. The results also revealed that all independent variables have a positive influence on E-Commerce adoption, and perceived trust is found to be the most dominant variable. The implications of this study suggest that students need to be exposed to online business platforms by seeding and guiding students through a comprehensive entrepreneurial ecosystem.

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1.0 INTRODUCTION

The boom in Internet technology has dramatically changed the daily routine of human life today. There are terms like working from home and shopping at the fingertips (Lestari, 2019). Online business is one of the fastest growing sectors or industries, like mushrooms growing after the rain. The number of Internet users in Malaysia is expected to increase to over 30 million by 2025. In the first quarter of 2022, Shopee's monthly visitors in Malaysia amounted to approximately 55 million. The number of visitors to the e-commerce site has doubled since the COVID-19 pandemic began in the first quarter of 2020 (Statista Research Department, October 5, 2022). Malaysia recorded income through e-commerce, with a total exceeding RM1 trillion recorded in 2021. Malaysia is currently on the right track to achieving the country's aspirations of recording RM1.65 trillion by 2025. Programs such as Go eCommerce Onboarding and Shop Malaysia Online, as of October 2021, have helped

more than 500,000 businesses adopt the e-commerce platform and the e-payment system (Malaysian Investment Development Authority (MIDA), 2022).

Traders who run enterprises virtually get a more significant market opportunity because online product marketing allows customers across the country to buy without physically attending a dealer's store (Behl et al., 2019). The presence of applications and e-commerce sites such as Shopee, Lazada, and Mudah have helped domestic traders to market products online without expensive costs. Merchants only need to send their products to logistics services such as Pos Malaysia and J&T Express nearby before sending them to buyers. It has opened opportunities for community members to earn side income. Online business gives many advantages to traders and entrepreneurs (Octavia et al., 2020).

However, online businesses cannot provide users the same shopping experience as physical purchases (Rosillo-Díaz, Blanco-Encomienda, & Crespo-Almendros, 2019). For example, if users wanted to buy clothes such as shirts or shoes, they need information such as the size of the clothes they are interested in and to measure themselves to determine whether it fits. Sometimes, the measurements are different from what is shown in the advertisement. Therefore, online business presents a risk to consumers against fraud by traders (Md Pauzi, Zaini, & Azni, 2021; Sutinen, Saarijärvi, & Yrjölä, 2022). At the same time, many consumers are less fond of using online business services (Zhang et al., 2020) because there have been incidents where the products took a long time to arrive, were damaged during delivery, or were stolen. This situation makes consumers switch back to conventional purchases. In addition, the success of engaging in online entrepreneurship is quite challenging, and it depends on several factors, such as money capital, infrastructure, knowledge and skills, and availability of goods and services (Hassen, Abd Rahim, & Shah, 2019). University students who are exposed to various entrepreneurship programs are seen as not interested in venturing into online entrepreneurship due to a lack of technical skills. Then, there are challenges to maximizing profits through online business. Entrepreneurs must go through various trials and challenges to be the first choice in customers' hearts. Entrepreneurs also have obstacles in getting the information needed in business and receiving product feedback (Farooq et al., 2019).

All these problems can be addressed with various suggestions to improve the efficiency of the online shopping system. Many factors have been discovered in influencing the adoption of online businesses. These include performance expectancy, perceived trust, and facilitating conditions (Tarhini et al., 2019; Zhou et al., 2021). Performance expectancy is the extent to which an individual's belief in the system and technology used can improve their business performance (Cheba et al., 2021; Kamolsook, Badir, & Frank, 2019; Mensah et al., 2021). In the context of this study, the researchers want to see the extent to which student entrepreneurs are confident and believe that E-Commerce can improve business performance while also being able to influence the intention to use E-Commerce. Then, in the online environment, trusting the service provider involves relying on an e-commerce platform. The degree of trust an individual possesses in a particular object/transaction

would differ depending on the time the trust is assessed (Haryanti & Subriadi, 2020).

Moreover, if the degree of trust exceeds the perceived risk threshold, the individual may be willing to take some risks, which involve initiating a financial transaction via the E-Commerce platform (Rashid & Ratten, 2021; Ventre & Kolbe, 2020). Finally, entrepreneurs will be more willing to adopt technology if infrastructure and customized training assistance are easily accessible (Ikumoro & Jawad, 2019; Kumar & Ayedee, 2021). Entrepreneurs should take the facilitating initiative provided by the government, which offers a platform for selling products online. The involvement of entrepreneurs in the virtual hub is a method that can expand the market more quickly and cost-effectively. Therefore, the government has allocated significant funds to ensure that ICT-related equipment and needs are complete and continue to benefit all levels of Malaysian society, especially E-Commerce users. The private sector and private bodies are also significant in improving the effectiveness of implementing the E-Commerce system in Malaysia.

Therefore, this study was carried out to review the level of involvement of undergraduate students as traders in the use of E-Commerce and also to examine the influence of performance expectancy, perceived trust, and facilitating conditions towards the adoption of E-Commerce. Previous studies have focused on student involvement as buyers and students' entrepreneurship intention. Little attention is given to understanding the involvement of students as traders by using the E-Commerce medium as a basis for their business. Every year, more and more institutions of higher education, both private and public, are established worldwide to enable young people to continue their studies to a higher level. This higher education facilitates and expands the opportunities for young graduates to achieve their respective ambitions after finishing their studies. However, the unemployment problem has become a nightmare for many graduates. Unemployment is worsening from year to year. According to sources from the Department of Statistics of Malaysia (DOSM), in December 2021, the country's unemployment rate was at 4.2 percent, with 687,600 unemployed individuals (Atriz, 2022). In addition, three to four years of study is not easy, especially going through life in big cities. However, as visionary students, a difficult life journey is not an obstacle. Some students dare to find an alternative

to support their own pocket money, and E-Commerce is one of the branches that is increasingly attracting students' attention (Sabri, Roshafian, & Rafdi, 2020). In addition to generating income, they are exposed to a new environment that directly becomes a holistic student group, as emphasized by the Ministry of Higher Education (Azmi, Sabri, & Moi, 2018). With increasing awareness and business interests through entrepreneurship programs at the university and IT literacy, a primary question is to what extent students' involvement is as sellers in E-Commerce. Accordingly, this study attempts to address these main research questions:

- 1) What is the current state of Malaysian undergraduate students adopting E-Commerce?
- 2) What are the main factors that could contribute to Malaysian undergraduate students' adoption of E-Commerce?
- 3) How to enhance Malaysian undergraduate students' adoption of E-Commerce?

This study is significant for several reasons. The formation of these objectives is expected to contribute to validating the Technology Acceptance Model (TAM) through significant testing of the determinant factors. This study also delivers several managerial implications for entrepreneurship bodies and higher learning institutions to plan future entrepreneurship programs related to E-Commerce. This study was conducted on youths currently studying in public and private universities. Studying entrepreneurial behaviour among students at higher learning institutions will allow proper plans and actions to be formulated. Compared to the students in primary and secondary education, intervention endeavours may be less appropriate because the students still need to be more mature in assessing the challenges related to E-Commerce.

2.0 LITERATURE REVIEW

2.1 E-Commerce

Students and graduates need training, motivation, and capital support to help them realise their desire to start an online business. To support student entrepreneurship, the Ministry of Higher Education has launched the Entrepreneurship Action Plan for Higher Education

Institutions 2021-2025 to sustain the entrepreneurship agenda in higher education institutions. The three (3) central strategic cores outlined in this plan are: 1) to establish a synergistic and holistic entrepreneurial ecosystem, 2) to empower high-impact entrepreneurial networks, and 3) to emphasise entrepreneurship based on innovation and technology. The implementation of the three core strategies is translated through six (6) main focuses, namely, 1) basic knowledge in entrepreneurship, 2) knowledge in advanced entrepreneurship, 3) business knowledge, 4) extra curriculum activities for entrepreneurship, 5) human development skills, and 6) entrepreneurship apprentice. The plan also aims to promote E-Commerce among Malaysian students since it is more flexible, less costly, comfortable, and efficient and can offer various products and services.

The E-Commerce application is one of the seven flagship applications introduced by the government through the Multimedia Super Corridor (MSC) in 1998. The flagship application in the MSC consists of seven applications in total, which consist of electronic government applications, multi-purpose cards (mykad), smart schools, telehealth, borderless marketing including e-commerce, technology entrepreneur development, research and development (R&D) (Fadzil et al., 2019). Since the spread of the COVID-19 epidemic, the convenience of online purchases is becoming a norm in society (Octavia et al., 2020). Malaysia has become the country with the highest rate of digital users in the Southeast Asian region. Malaysia is ahead of other countries in the region, with 22 million citizens being digital users. Malaysia has the highest ratio of digital users in Southeast Asia, which is 88%, compared to the average of the other six countries, which is 78 percent, thus showing high digital retail penetration in the market (Zainuddin, 2021). The emergence of the Internet around the world has contributed to various intermediate business tools. E-Commerce is a method or mechanism that facilitates trading activities faster. In addition to E-Commerce, other terms used for describing transactions over the Internet are iCommerce, Internet Commerce, and Digital Commerce (Chmielarz et al., 2022).

E-Commerce involves business-to-business (B2B: Business to Business) and business-to-customer (B2C: Business to Consumer) via the internet or computer networks (Miao et al., 2019). According to Mustafa Omar (2004), E-Commerce from an Islamic point of view has a definition that is almost the same as the conventional

view. What differentiates it is that some rules and principles must follow the foundation of Islam (as cited in Sholikhin & Amijaya, 2019). This includes validity data information control, security validity transactions, legitimacy in promoting goods, and honesty in receiving payment and delivery of goods. E-commerce platforms have a wider reach than physical businesses. With the existence of Internet access, it becomes an excellent opportunity for traders to expand their business. With e-commerce, a product can be marketed more widely to meet the needs of local and international consumers (Behl et al., 2019; Octavia et al., 2020). In addition, online businesses can also reduce product marketing costs through free marketing. Businesses physically in stores usually use flyers or posters to promote products from their stores. This way incurs a lot of cost compared to the more efficient way of online business marketing. Online businesses can also reduce other costs, such as transportation costs, additional employee costs, and others. Reducing costs can indirectly optimize business profits (Qi et al., 2020).

2.2 Theoretical Foundation: Technology Acceptance Model (TAM)

Technology Acceptance Model (TAM) is a model that explains the acceptance of the use of technology (e-commerce) and the behaviour of its users (Davis, 1989). TAM aims to clarify and calculate user acceptance and influencing factors acceptance of technology. TAM explains the relationship between cause and effect between belief and behaviour, purpose/need, and the actual use of users of an information system. According to Davis (1989), there are two main concepts in user acceptance: perceived ease of use and perceived usefulness.

Perceived ease of use is a person's belief that using information system technology (e-commerce) will be easy and does not require hard work (Ritz, Wolf, & McQuitty, 2019). Perceived usefulness is defined as a person's level of trust that using information systems (e-commerce) improves performance in his/her job (Ritz, Wolf, & McQuitty, 2019). The use of e-commerce is also determined by individual perception and attitude, ultimately shaping a person's behaviour in information technology (e-commerce). Attitude toward using TAM is conceptualized as an attitude towards using a system in the form of acceptance or rejection as an impact when

someone uses technology in his/her work (Davis, 1989). Attitude explains one's acceptance of information technology. A person's attitude consists of cognitive, affective, and components related to behaviour. Actual system usage is then a natural behaviour in adopting a system. Actual system usage is a form of external psychomotor response measured by someone with actual use (Davis, 1989).

According to this study, performance expectancy and perceived trust represent perceived usefulness, and facilitating conditions help improve the perceived ease of use. The perception of benefits and trust can help the entrepreneur's decision-making process. The higher the use of technology that users feel, the higher their interest to use the application will be. Perception of usefulness (perceived usefulness) is when individuals believe that using a particular technology will improve performance (Kamolsook, Badir, & Frank, 2019). According to Davis (1989), this concept consists of 1) Making work faster, 2) being Useful, 3) Increasing productivity, 4) Increasing effectiveness, and 5) Developing job performance. Previous research shows that the perception of usability positively affects an individual's interest in using e-commerce (Cheba et al., 2021). Kamolsook, Badir, & Frank, (2019). Trust is used to lower the behavioural complexity humans face when facing uncertainty. The higher the user's trust in e-commerce technology, the greater user interest in the application (Ventre & Kolbe, 2020). If the users feel trust and are confident that the online application is safe and meets their expectations, this can increase their interest in using the application. Trust is the primary driver of all e-commerce business models. Previous research, such as Haryanti and Subriadi (2020) and Rashid and Ratten (2021), shows that trust positively affects an interest in using e-commerce.

On the other hand, this study extended the TAM model by promoting the facilitating conditions as an enabler of perceived ease of use. Davis (1989) mentions the indicators used to measure perceived ease of use that is quickly learned, flexible, able to control work, and easy to use. Infrastructure such as computers and smartphones, software, and network components has opened up new opportunities for firms to conduct business more flexibly, save production costs, and increase business productivity (Ikumoro & Jawad, 2019). Basic facilities are the main pulse in determining the rapid development of e-commerce use. Many countries have begun to focus on developing infrastructure and facilities, especially in the

field of ICT, to face the increasingly challenging cyber world (Kumar & Ayedee, 2021). Based on the discussion, three research hypotheses have been formed to be tested, namely:

H1: Performance expectancy significantly predicts E-Commerce adoption among Malaysian undergraduate students.

H2: Perceived trust significantly predicts E-Commerce adoption among Malaysian undergraduate students.

H3: Facilitating conditions significantly predicts E-Commerce adoption among Malaysian undergraduate students.

Based on the discussion of research highlights and current issues, the study suggests three independent variables and a dependent variable to identify the determining factors for adopting E-Commerce. The proposed conceptual framework model is shown in Figure 1.

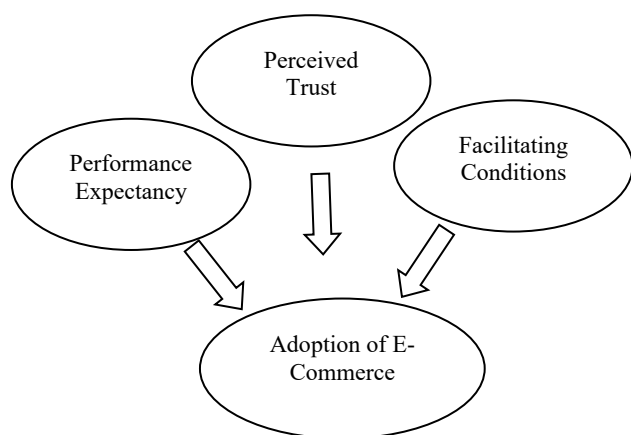


Figure 1: Conceptual Model of the Study

3.0 METHODOLOGY

The study population consisted of undergraduate students from both public and private universities in Peninsular Malaysia. This study used a cross-sectional survey design involving 384 undergraduate students who have ventured into online business. This sample was selected randomly, and the sample size is according to Krejcie and Morgan's (1970) sample size determination. The questionnaire constructed by the researchers is a questionnaire adapted and modified from Dutot (2015), Gao and Bai (2014), and Pinochet et al. (2018). The psychometric index questionnaire contains five main parts. Section A contains

demographic profile items; Section B contains performance expectancy items; Section C contains perceived trust items; Section D contains facilitating conditions; Section E is E-Commerce adoption items.

Table 1 Survey Instrument

Construct	Item	Source
Performance Expectancy	<ul style="list-style-type: none"> • Performance expectancy is very useful for business. • Performance expectancy can enhance productivity in business. • Performance expectancy can increase performance in business. • Performance expectancy will enable people to accomplish tasks efficiently. • Performance expectancy brings convenience to business. 	Gao and Bai (2014), Pinochet et al. (2018)
Perceived Trust	<ul style="list-style-type: none"> • Perceived trust is essential in both social interaction and factors affecting technology adoption. • Individual trust in social media as a reliable business platform. • Trust has a strong positive effect on the adoption of online business in Malaysia. • Perceived trust takes time as it leads to decision-making process. • Trust is an essential part of adoption and technology acceptance nowadays. 	Gao and Bai (2014), Dutot (2015)
Facilitating Conditions	<ul style="list-style-type: none"> • Facilitating conditions can make a person comfortable utilizing it in an online business. • Facilitating conditions helps the availability of time, money, and technological resources for technology adoption. • Facilitating conditions proved to have the most significant influence on online businesses. • Facilitating conditions can help to get feedback from customers efficiently. • Facilitating conditions have a positive aspect that might influence adoption if it meets expectations. 	Gao and Bai (2014), Dutot (2015)
E-Commerce Adoption	<ul style="list-style-type: none"> • E-Commerce has taken control of almost all levels of my business process. • E-Commerce allows my business to reach a larger audience at a low cost. • E-Commerce helps me to manage the business from anywhere at any time. • I believe transactions and comparison shopping are facilitated by E-Commerce. • With the help of social media, my businesses now have the chance to compete with much larger ones worldwide. 	Pinochet et al. (2018)

Validity, normality, and reliability were assessed to ensure that this questionnaire instrument could be used. The normality test with Skewness and Kurtosis has the advantage where with the skewness/kurtosis test, it can be known whether the normality graph is skewed to the right or the left, too flat, or collected in the middle. Therefore, normality test with Skewness and Kurtosis is also often referred to as a measure of data persistence. Skewness value should fall within the range of -3 to +3, while kurtosis, the range of -10 to +10, needs to be assumed (Kline, 2005). Based on the study of Gliner and Morgan (2000), the minimum coefficient value that can be used is at the level of 0.6 to 0.7. Therefore, a Cronbach Alpha value exceeding 0.8 indicates that the instrument is perfect and acceptable (Gliner & Morgan, 2000).

In this study, data analysis involves descriptive and inferential statistical analysis involving the mean score and standard deviation in determining the level of Malaysian undergraduate students' adoption of E-Commerce. This study's mean score interpretation value was adapted from Nunnally's (1978) study, which indicates a 1.00 –2.00 score for Low, 2.01 -3.00 score for Medium Low, 3.01 –4.00 score for Medium High, and 4.01 –5.00 score for High, while for the analysis of the main factors that could contribute to Malaysian undergraduate students' adoption of E-Commerce, Pearson's correlation and regression analysis were employed. The data in the study were analysed using the Statistical Package for Social Science Version 23.0 (SPSS) software.

4.0 FINDINGS

After two months of data collection, valid data from 314 respondents were received. For the gender category, 52.2% of respondents are female (n=164), and 47.8% are male (n=150). Most respondents were 20-29 years old (65.3%, n=205). This is followed by 30-39 years old (22.6%, n=71), 18 years old and below (7.3%, n=23), and 40 years old and above (4.8%, n=15). For the status category, as many as 70.1% of respondents are single (n=220), and 29.6% are married (n=94).

A validity test was conducted to measure the validity of the instrument. Kaiser-Meyer Olkin's measure of sampling adequacy (KMO) was 0.911 (> 0.70), which was acceptable, and Bartlett's test of sphericity was significant ($p < 0.001$), which indicated that the correlations between variables are significantly different

from zero. These provide minimal standards that should be met before conducting a factor analysis. The eigenvalue determines the number of factors. Using the Principal Component Analysis (PCA) method, four factors have an eigenvalue of more than 1. Then, 52.67 percent of the total 4-factor variance is explained. According to Hair et al. (2010), factor loadings ± 0.3 to 0.4 are minimally acceptable for item loading. The factor loads belonging to the items are listed in Table 2. Factor loads ranged between 0.777 and 0.516, indicating acceptable item loading.

Table 2 Factor Loadings

Construct	Item	Component			
		1	2	3	4
Performance Expectancy	P1	0.716			
	P2	0.646			
	P3	0.676			
	P4	0.546			
	P5	0.526			
Perceived Trust	PT1		0.726		
	PT2		0.786		
	PT3		0.596		
	PT4		0.546		
	PT5		0.516		
Facilitating Conditions	F1			0.777	
	F2			0.626	
	F3			0.546	
	F4			0.551	
	F5			0.543	
E-Commerce Adoption	E1				0.616
	E2				0.635
	E3				0.634
	E4				0.511
	E5				0.532

Table 3 Mean & Normality Results

Variable	M	SD	Skewness	Kurtosis
Performance Expectancy	4.391	0.478	-0.450	-0.173
Perceived Trust	4.361	0.503	-0.491	-0.318
Facilitating Conditions	4.355	0.502	-0.736	0.621
E-Commerce Adoption	4.403	0.493	-0.982	1.929

Table 4 Reliability Results

Variable	Cronbach's Alpha	No. of Items
Performance Expectancy	0.817	5
Perceived Trust	0.802	5
Facilitating Conditions	0.823	5
E-Commerce Adoption	0.814	5

This study's mean score interpretation value was adapted from Nunnally's (1978) study. From Table 3, it can be seen that the level of performance expectancy (M=4.391, SD=0.478), perceived trust (M=4.361,

SD=0.503), facilitating conditions (M=4.355, SD=0.502), and E-Commerce adoption (M=4.403, SD=0.493) are at a high level. This indicates that Malaysian undergraduate students' current adoption of E-Commerce is good. Exposure to entrepreneurship implemented in many institutions of higher learning positively impacted the students' entrepreneurship. They start to think of the business world as one of the sources of income or for earning extra money while they are still studying or after graduation. The results show that the skewness and kurtosis values fall within the range of -3 to +3 and 10 to +10, so the data is distributed normally. From Table 4, the Cronbach's Alpha values results for all variables are more than >0.60, and it can be concluded that all question items in the questionnaire are consistent or reliable.

Table 5 Correlation Results

		E-Commerce Adoption
Performance Expectancy	Pearson correlation	0.461**
	Sig.	0.000
	N	314
Perceived Trust	Pearson correlation	0.524**
	Sig.	0.000
	N	314
Facilitating Conditions	Pearson correlation	0.537**
	Sig.	0.000
	N	314

Correlation can be interpreted as a relationship between variables. The strength of the relationship is expressed in the correlation coefficient, often abbreviated as *r*. At the same time, the direction of the relationship is shown with a positive or negative relationship. From Table 5, it was found that there is a relationship between performance expectancy and E-Commerce adoption with $r=0.567$; $p<0.01$. The higher the performance expectancy, the higher E-Commerce adoption. Thus, H1 is accepted. Then, from the results of the correlation test between perceived trust and E-Commerce adoption, it can be known that the probability of $0.000 < 0.05$ (significant level 5%), which can be concluded that there is a significant positive relationship between perceived trust and E-Commerce adoption. Thus, H2 is accepted. Finally, it is known that the value of the Pearson correlation coefficient between facilitating conditions and E-Commerce adoption is 0.537. This means that the two variables are correlated. It also can be seen that the p-

value is 0.000. Thus, the result is successful in accepting H3.

Table 6 Regression Results

Variable	Beta (β)	Sig. (<i>p</i>)	Tol.	VIF
Performance Expectancy (β_1)	0.131	0.022	0.615	1.626
Perceived Trust (β_2)	0.304	0.000	0.685	1.460
Facilitating conditions (β_3)	0.314	0.000	0.624	1.604
R ²	0.388			
Adjusted R ²	0.383			
F Change	65.647			
Sig.	0.000			

Before regression data interpretation can be made, the multicollinearity test needs to be fulfilled first. It is a test to ensure no intercorrelation or collinearity between independent variables in a regression model. Intercorrelation is a linear relationship or a strong relationship between one independent variable or predictor variable with another predictor variable in a regression model. The intercorrelation can be seen with the correlation coefficient value between the independent variables, the VIF and Tolerance values, the Eigenvalue and Condition Index values, and others. If the VIF value is less than ten and the Tolerance value is more than 0.01, it can be firmly concluded that there is no multicollinearity problem. Based on Table 6, this study fulfilled the assumption of multicollinearity. R square is the coefficient of determination that explains how far the independent variables can explain the dependent variable.

R square has a value between 0 - 1 with the provision that the closer to the number one means, the better. From Table 6, the R square value of 0.388 means that the independent variable can explain 38.8% of the spread of the dependent variable. The remaining 61.2% cannot be explained by independent variables but can be explained by variables outside of independent variables. Next, β_1 shows 0.131, which means that if performance expectancy experiences an increase of 1%, then E-Commerce adoption will increase by 0.131, assuming that other independent variables are considered constant. A positive sign means that the influence is in the same direction between the independent and dependent variables. Then, β_2 shows 0.304, which means that if perceived trust experiences an increase of 1%, then E-Commerce adoption will increase by 0.304, assuming that other independent variables are considered constant. Finally, β_3 shows 0.314, which means that if facilitating conditions experiences an increase of 1%, E-Commerce

adoption will increase by 0.314, assuming that other independent variables are considered constant. From the results, the beta value for perceived trust (0.304) revealed that perceived trust is the most influential variable in adopting E-Commerce among Malaysian undergraduate students.

5.0 DISCUSSION

This first finding found that Malaysian undergraduate students' current adoption of E-Commerce is at a high level. Students nowadays are wise to seize opportunities as the Ministry of Higher Education recommended. Online business is one of the side incomes that can be done either by drop shipping or directly. Compared to having a store, it is faster to generate profit through internet business. With a smartphone, online business can be run anywhere. Various software and apps allow students to conduct business activities such as promotions, customer feedback, check orders, and others (Azmi, Sabri, & Moi, 2018). In addition to being driven by an interest in business, most students involved in online businesses are those who want to help their parents financially because they do not want to depend on loans from the National Higher Education Fund (PTPTN) (Sabri, Roshafian, & Rafdi, 2020). Thus, it is suggested that the university increase training for students, such as learning to do business in Shopee and Lazada, website development courses, mobile apps development courses, and email marketing courses (Singh, 2020).

The second finding revealed that all independent variables have a positive influence on E-Commerce adoption, and perceived trust is found to be the most dominant variable. The results were consistent with the previous studies (e.g., Kamolsook, Badir, & Frank, 2019; Cheba et al., 2021; Ventre & Kolbe, 2020; Haryanti & Subriadi, 2020; Ikumoro & Jawad, 2019), where E-Commerce can help to save cost, helpful, trusted, and flexible. In addition, the capital to start an online business is cheaper than the cost of rent and renovation of the premises. Therefore, the risk of experiencing losses is also lower (Ventre & Kolbe, 2020). Traders also can target customers all over Malaysia, and the online store is open around the clock. There must be a solid Internet connection and an excellent gadget to take reservations, answer questions, update websites, and manage social media (Ikumoro & Jawad, 2019). Most generation Z, especially students, frequently browse the Internet in their residential colleges due to the convenience of fast Internet

access services. This opens up the broadest possible space and opportunity for them to venture into the online business world.

It is also quite challenging for students to manage their study time while doing business. Students need to look for viral and trending social media products to sell and gain buyers' trust quickly. Therefore, before starting a business, students need to prepare by finding tips and ideas that are interesting and trending. For instance, among the most successful businesses, many students drop ship, a reseller without holding stock to sell. It is easy to sell and easy to manage. Another trending online business is becoming YouTubers, where the students can create content such as beauty tips, cooking tips, or sewing tutorials that attracts people to watch their channel. Thus, they need to continue to learn by attending various training programs to upgrade their knowledge and skills so that online traders are always up-to-date. ICT literacy covers a person's computer skills and includes the skills to use other technological tools such as digital cameras, video, scanners, and others.

6.0 CONCLUSION

Online business nowadays has become an everyday lifestyle for internet users worldwide. Various websites have been created to facilitate the selling process. A total of 384 respondents were selected among generation Z undergraduate students. The study aims to determine the relationship between performance expectancy, perceived trust, facilitating conditions, and adopting E-Commerce. The data obtained through the survey form is analysed by conducting analysis descriptive, Pearson Correlation, and regression analyses. The results show a significant relationship between the three independent variables and the adoption of E-Commerce. This finding can benefit several parties, such as the Ministry of Higher Education, universities, and related agencies. To develop digital entrepreneurship in higher education, all parties must work together to improve and diversify courses and more relevant and up-to-date entrepreneurial activities. There are limitations of this study that should be considered in evaluating the results of the study. First, this study only looks at performance expectancy, perceived trust, and facilitating conditions. This study does not take into account other factors such as family income factors, courses, family business background, and others. Therefore, the results of this study are only limited to these three factors. It is hoped that future researchers will highlight other factors influencing E-Commerce

adoption. Second, this study only uses a sample of 314 undergraduate students in Peninsular Malaysia. The results of this study may differ from samples from students in other states, such as Sabah and Sarawak. The effect and ability to give a better picture of the sample are limited. Therefore, the results of this study cannot be generalised. It is suggested that researchers will generalise the sample area so that the information from the research can be seen from various educational institutions. The third is the use of cross-sectional research. In this regard, a longitudinal study must describe dynamic natural conditions post-adoption of E-Commerce. A cross-country or cross-cultural study is necessary to test this model's capability to be a general model. Future studies are also expected to focus on comparing different segments (for example, generation X, Y, and Z) or against different cultures that are expected to be one exciting field of study.

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