

The Acceptance of the eRezeki Digital Platform in Kuala Selangor, Malaysia

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This paper presents the Technology Acceptance Model (TAM) in determining the acceptance of the eRezeki digital workforce platform among eRezeki trainees. The eRezeki Program was launched by the Malaysian government to support the Bottom 40 (B40) group by increasing their quality of life through the leveraging of digital economies. A group of 166 respondents in Kuala Selangor have taken part in the survey and joined the eRezeki training program in November 2019. The proposed model, which consists of perceived usefulness, perceived ease of use and behavioural intention, has been developed to measure the acceptance among eRezeki trainees in using the eRezeki digital platform to generate extra income.

Keywords: *eRezeki, Digital Platform, Digital Economies, B40 Community, Perceived Usefulness, Perceived Ease of Use, Behavioural Intention.*

Introduction

The Malaysian eRezeki digital platform was established in 2015, particularly to assist the Bottom 40 (B40) community in earning a higher income. The B40 community includes the household income earners who earn below RM4000 a month, blue-collar workers, the unemployed and under-employed individuals, students, housewives, retirees and senior citizens (Hamid, Haron, Abdullah, Ali & Hamid, 2020). In the event of high inflation, recession and digital economies, it is expected that a severe impact would affect the B40 community the most. In fact, the B40 community was noted to have struggled to cope with cost of living and obtaining better education and health services in the current situation (Asmahanim, 2015). The eRezeki program enables these B40 income groups to generate additional income by completing digital assignments based on a crowdsourcing concept. The focus is more on additional income generation rather than a permanent job because the nature of the digital task

assigned is based on project for a certain period of time. In fact, it can be completed regardless of location and time. Therefore, it is suitable for those who intend to increase their income without changing their permanent job working hours. To date, few public universities in Malaysia have been actively involved in promoting the benefits of using the eRezeki digital platform by targeting the students to join the program.

To ensure that the eRezeki digital platform can be utilised effectively, trainers have been employed to educate and inform the B40 community. The knowledgeable trainers were selected carefully to ensure the best resources could be effectively used in sharing the benefits of the eRezeki platform (Hamid et al, 2020). Communicating with the B40 community may pose a challenge if not strategically implemented. In order to increase the effectiveness of the mechanism, these trainers were subsequently supplied with various modules relating to the usage of the eRezeki digital platform to be used by the B40 community collectively.

Technology offers many options for accessing and providing information, delivered when and where people work or live (Manaf & Ismail, 2009) for various intended objectives. Notably, the use of information technology (IT) has not only affected ways business would carry out the business process, but also in the context of to what extent the users will be ready for the project (Haug, Peterson & Arlbjorn, 2020). E-readiness can be related to the ability of using a digital platform in relation to the rapid rate of internet penetration throughout the world (Choucri et al, 2003). In this study, the e-readiness is in the context that the B40 community is conducive to internet-based opportunities. Technology readiness is clearly important when technology is an indispensable component in the concomitant production and consumption of service offerings (Pousheh & Vasquez-Parraga, 2018). Undeniably, the biggest challenge may come from the users of the eRezeki digital platform itself. Customer readiness refers to the degree of which consumers are equipped with the necessary knowledge, skills and motivation to participate in the process of service production and delivery (Pousheh & Vasquez-Parraga, 2018). In this study, customers are assessed based on the perspective of users of the eRezeki digital platform. Issues related to authenticity and integrity of information due to digitalisation may pose a threat to the users, especially if the information is not managed accordingly (Manaf & Ismail, 2009). Consequently, IT readiness can be improved once the problem areas have been identified and necessary actions can be taken to address the issues (Haug, Peterson & Arlbjorn, 2020). The acceptance level can be varied based on individual characteristics that may be diverse relative to other users of the eRezeki digital platform. The importance of identifying the problems will assist the Multimedia Development Corporation (MDEC) and government in ensuring the introduction of the eRezeki digital platform being able to eliminate difficulties confronted by the B40 community.

Given these, the main objective of the study is to explore the acceptance level of the eRezeki digital platform to increase income from the perspective of the trainees who attended the

training sessions organised in one of the public universities in Malaysia. Trainees who attended the training sessions are perceived as potential users of the eRezeki digital platform and a proxy for the B40 community. The study conducted will explain the acceptance level based on the Technology Acceptance Model (TAM) with two main elements explained, namely, perceived ease of use and perceived usefulness complemented by the behavioural intention of the users. This model can be well used in explaining the impact of digitalisation on the initiative conducted. The behaviour is worthwhile in studying because at present, no literature has been conducted in relation to the eRezeki digital platform based on the TAM model. The acceptance level will then affect the effectiveness of government mechanisms in improving the way of life of the B40 community. Alternatively, more effective initiatives should be conducted to support the eRezeki digital platform in an event that the findings of this research are not favourable.

This study is also expected to be able to close the gap by providing evidence on the issues related to the readiness of using the current eRezeki digital platform despite the training session that had been attended by the trainees. Though the training session conducted assisted the participants in understanding the eRezeki digital platform, there is still room for improvement that needs to be tackled to ensure that initiative led by the MDEC is effective. Examination of variables will enable analysis of how the users can become ready to participate in the eRezeki digital platform (Pousheh & Vasquez-Parraga, 2018).

The remainder of this paper is structured as follows. Section II provides the literature review, followed by Section III that provides the research methodology used in this study. Results and discussion will be provided in Section IV. Section V will then summarise the research and provide conclusions together with limitations in relation to the study conducted.

Literature Review

E-Rezeki Program

As the people are key drivers of the broader economy, digital inclusivity is crucial for Malaysia in developing a vibrant digital economy. Following the introduction of the eRezeki programs by MDEC in 2015, the agency launched its digital #YOU CANDUIT initiative to target young people, small and medium enterprises (SMEs), digital entrepreneurs and the B40 community. The eRezeki program provides individuals and low-income households with the ability to generate revenue through digital technologies. Individuals are given training under the system on how to perform adequate tasks and become part of the productive digital workforce. Participants are exposed to innovative, realistic and applicable digital marketing strategies for the current internet users.

To date, few public universities in Malaysia have been actively involved in promoting the benefits of using the eRezeki digital platform. Led by the Multimedia Development Corporation (MDEC), the importance of using the eRezeki digital platform has been communicated across Malaysia. The main reasons of the digitisation initiative are to enhance and improve access to information (Manaf & Ismail, 2009).

Technology Acceptance Model (TAM)

A few theories have been widely used by literature to explain what factors affect user's beliefs and attitudes on technology acceptance decisions. The Technology Acceptance Model (TAM) model is one of most widely used methods being used to explain, as the model was derived from another model i.e. Theory of Reasoned Action (TRA) that can explain human behaviour and intention (Lee, Kozar & Larsen, 2003). Accordingly, the attitudes of a person will eventually determine whether the user will accept or reject the system and these are being influenced by major beliefs which include the perceived usefulness and perceived ease of use with perceived ease of use having a direct influence on perceived usefulness (Chuttur, 2009). System characteristics and probability of the system use were taken into consideration by examining the attitudes of users for the particular digital platform (Legris, Ingham & Collette, 2003).

The TAM model which has been developed by Davis (1989) is one of the most common research models for predicting the use and adoption of information systems and technology by individual users. The TAM model has been extensively studied and validated by numerous studies that investigate individual technology acceptance in different structures of information systems. According to the TAM model, there are two relevant factors that are important in determining whether the users will accept or reject a certain system. Those factors are perceived usefulness and perceived ease of use by the individual user. Davis (1989) characterises perceived usefulness as user's subjective probability that a particular application framework will improve his or her work or life execution. Perceived ease of use can be defined as the degree to which the potential user expects the target system to be free of effort. Since the TAM model was first proposed, it has been gradually refined and several other variables are added to the original TAM model, such as behavioural intention (Chen, Rong, Ma, Qu and Xiong, 2017).

Researchers around the world have used the TAM model to explain the acceptance of the various forms of information systems. A meta-analysis of 145 TAM articles was performed by Yousafzai, Foxall, and Pallister (2007), and most of the studies examined showed that there was a direct relationship between perceived ease of use and user behaviour, and that usefulness had a major effect on behavioral intent.

Researchers have applied the TAM model to study acceptance of technology with respect to new methods and techniques in education, for example to investigate students' acceptance on the adoption of blended e-learning systems (Al-Azawei, Parslow, & Lundqvist, 2017). The TAM model was also used to analyse the acceptance of students use of emerging technology in education, for example YouTube and mobile technologies (Lee and Lehto, 2013; Briz-Ponce et al, 2017). Many studies have used the TAM model to evaluate students' (Wu, Chang, Hsu and Chen, 2010) and academic staffs' (Radif, Fan and McLaughlin, 2016) acceptance of learning management systems.

Perceived Usefulness and Perceived Ease of Use

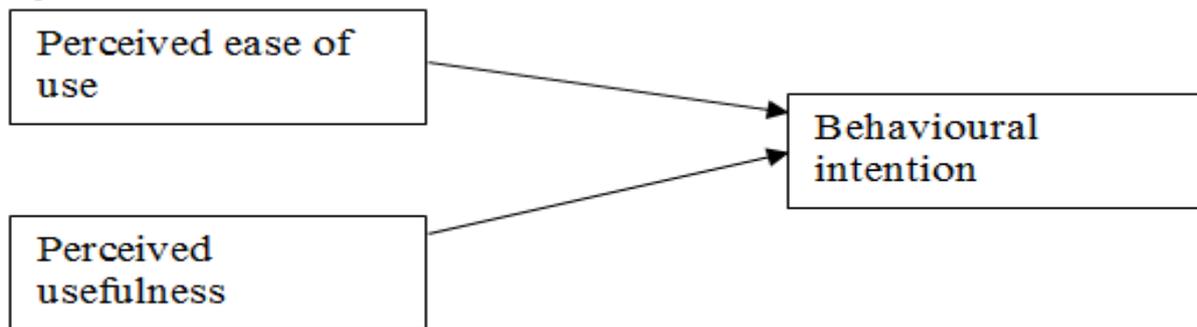
In TAM's initial research, perceived usefulness and ease of use are the most important and significant determinants of the acceptance of technology. Perceived usefulness is generally defined as the extent to which users of technology believe that using a system will help in enhancing their performance (Davis, 1989). If users of the technology perceive that the system is beneficial to their usage, then the level of acceptance is likely to be high. Otherwise, the users of technology may either stop using the system or face technical-stress (Yao & Cao, 2017).

Perceived ease of use is defined as the degree to which users of technology believe that using technology will bear minimum effort on their part (Davis, 1989). In other words, users of technology expect the application to be user-friendly and simple to use in order to help them perform better in their jobs. Davis (1993) argued that perceived ease of use directly affects perceived usefulness, while perceived usefulness does not have an impact on perceived ease of use. Therefore, since the formation of perceived usefulness judgment is mainly dependent on perceived ease of use (Venkatesh and Davis, 2008), the easier the trainees perceive the e-Rezeki application to be used, the greater usefulness they feel the e-Rezeki application will provide them. The causal relationship from perceived ease of use to perceived usefulness has been validated in previous studies (Mohamed and Abdul Karim, 2012; Lee, Hsiao and Purnomo, 2014; Muk and Chung, 2015).

Therefore, for the purpose of this study, we will examine the perceived of ease of use and perceive usefulness will influence the intention of the users to use eRezeki digital platform. Hypothetical relationship among these variables is displayed as in Figure 1. It is hypothesised as below:

- H1:** There is a significant relationship between perceived ease of use and behavioural intention.
- H2:** There is a significant relationship between perceived usefulness and behavioural intention.

Figure 1. Research Model



Methodology

This study adopts a quantitative method in which survey questionnaires were distributed among eRezeki trainees in Kuala Selangor. The research grant received required the study to be conducted in the Kuala Selangor district for the benefit of Kuala Selangor itself. The respondents involved in the study were those already participating in the eRezeki training program. The eRezeki training program was especially for the B40 group to utilise the advantages of digital economies. They were trained to improve the skills needed in the digital taskforce. They also had to learn to use the digital platform and enhance new digital skills. The aim was to eventually improve their visibility in the digital workforce market. The skills learned were not limited to the eRezeki digital platform but could also be applied to other digital platforms. The training was conducted in November 2019 at a public university in Kuala Selangor and was attended by 326 participants.

A cross sectional questionnaire was developed with four sections. The first section was to record the demographic information of the participants. The variables of demographic measurement included gender, age, education level, level of income and the familiarity of using a digital platform in daily tasks. Data was measured using a 5-point likert scale with 1 indicating strongly disagree and 5 strongly agree. The second section of the questionnaire was to measure the perceived ease of use of the eRezeki digital platform to increase their income after joining the eRezeki training. The third section was to measure the respondent's perceived usefulness of the digital platform in increasing their income. The last section was to measure the respondent's likelihood of using the digital platform again in future. There were 22 questions in total for this constructed questionnaire. The questionnaire was distributed to the respondents via a google form after they ended their eRezeki training in Kuala Selangor. The form was bi-lingual, namely, Malay and English. The data was analysed using SPSS software.



Results and Discussion

In November 2019, there were 326 respondents who attended the eRezeki training located in a public university in the district of Kuala Selangor. However, only 166 respondents completed the survey which gives a 51% valid response rate. Table 1 shows the demographic attributes of the respondents. 87% of the respondents are female where the rest are male. All the respondents come from higher education backgrounds with almost 95 % of them having a bachelors degree. Almost 93% of the respondents earn below RM4000 per month which means they fall into the B40 income group. A high (83%) of the respondents indicate that they are comfortable working in digital environments. 41% of respondents refer to the internet as their main source of information. Alternatively, the rest refer to other media sources such as newspapers, television and radio broadcasts as their main sources of information.

Table 1: Demographic attributes of the respondents

	Frequencies	Percent (%)	Cumulative
Gender			
Male	21	12.65	12.65
Female	145	87.35	100
Education			
Diploma	9	5.42	5.42
Bachelor	157	94.58	100
Monthly Income			
Less than 1000	103	62.05	62.05
1001 - 2000	25	15.06	77.11
2001 - 3000	14	8.43	85.54
3001 - 4000	12	7.23	92.77
> 4000	12	7.23	100
Comfortable working in digital environment			
Strongly disagree	3	1.81	1.81
Disagree	1	0.6	2.41
Neutral	24	14.46	16.87
Agree	83	50	66.87
Strongly agree	55	33.13	100
Internet is main source of information			
Strongly disagree	2	1.2	1.2
Disagree	5	3.01	4.21
Neutral	23	13.86	18.07
Agree	41	24.7	42.77
Strongly agree	95	57.23	100

The cronbach alphas value of perceived ease of use is 0.948 and 0.967 for perceived usefulness indicating that each construct reliability was acceptable. Ideally, the Cronbach alpha coefficient should be more that 0.7 to indicate internal consistency among the items in each construct (Pallant, 2005). An explanatory factor analysis using Principal Component Analysis was conducted and suggested for convergent and discriminant validity of the construct. Total variance explained amounted to 73%. The Kaiser-Meyer-Olkin Measure of Sampling

Adequacy (KMO) is 0.949 and Bartlett's test is significant ($p = .000$) showing that factor analysis is appropriate.

Next, regression analysis was performed using SPSS Software. The collinearity diagnostic performed indicated the tolerance value for each independent variable is 0.437 (less than 0.1) and a VIF value of 2.286 (below 10). Therefore, no multicollinearity assumption has been violated.

Table 2: Model Summary

Model Summary ^b				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.889 ^a	0.790	0.787	0.39900
a. Predictors: (Constant), perceived usefulness, perceived ease of use				
b. Dependent Variable: behavioural intentions				

Table 3: Anova Table

ANOVA ^a					
	Sum of Squares	df	Mean Square	F	Sig.
Regression	97.526	2	48.763	306.290	.000 ^b
Residual	25.950	163	0.159		
Total	123.476	165			

Table 2 and 3 above show that the perceived usefulness and perceived ease of use model explained almost 79% of the variance in the dependent variable. These independent variables can be used reliably to predict the behavioural intention to use digital platform ($p = .000 < 0.05$).

Table 4: Coefficient Table

Coefficients					
	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
(Constant)	0.025	0.199		0.127	0.899
perceived ease of use	0.064	0.077	0.055	0.834	0.405
perceived usefulness	1.039	0.078	0.880	13.321	0.000

The coefficient for perceived ease of use is 0.064 and not statically significant ($p = 0.405$) in predicting the behavioural intention to use the eRezeki digital platform. It indicated a mixed response from the respondents which means they might have found it not easy to use the eRezeki digital platform in increasing income. The reasons might be due to the less user-

friendly features of the platform or that they prefer to use another digital platform other than the eRezeki digital platform to earn additional income. Furthermore, they prefer the conventional way of looking for additional income by asking around in person rather than using a digital platform. There is also the possibility they do not want to put effort into learning how to use this platform merely for a part time job.

Meanwhile for perceived usefulness, the coefficient is 1.118 and is significant at a 1% significant level ($p=0.000$) showing that respondents agree that using this platform will be beneficial for them. It is easier for them to be reached by potential employers and they become more visible in the wider job marketplace. This is in line with a study done by Kristensen (2016) and Isaac, Abdullah, Ramayah, Mutahar and Alrajawy (2016) when one perceives the digital platform is a beneficial and useful tool for them, the usage tendency will be higher.

Conclusions and Limitations

This research presents the acceptance factors among eRezeki trainees in Kuala Selangor, Malaysia towards the eRezeki digital platform in generating additional income. The eRezeki training is a government program introduced in 2015 and led by the Multimedia Development Corporation (MDEC). It is targeted to the Bottom 40 (B40) income group to earn additional income by utilising digital economies. The skills needed as part of the digital taskforce range from simple digital skills i.e., digital micro skills to high digital skills. Based on the Technology Acceptance Model (TAM) used to measure the intention to use the eRezeki digital platform among 166 eRezeki trainees, two predictors have been employed, namely, perceived ease of use and perceived usefulness. The results showed that perceived usefulness has a significant relationship with the behavioural intention (intention to use) but not perceived ease of use.

This study provides an important contribution as no literature has been conducted in relation to the eRezeki digital platform based on the TAM model before. The government of Malaysia can improve its digital infrastructure by looking at the behavioural perspective of the users themselves. With internet penetration of 86% nationwide as at 2018 (Lim, 2019), Malaysia has a better opportunity to explore and utilise the potential of digital economies. However, there were certain limitations in the study. The sample of respondents was limited to those located in Kuala Selangor. The study conducted was cross sectional in nature and was insufficient to measure the progress of digital skills improvement among the respondents. It is suggested a larger sample is needed and a longitudinal study to be conducted in the future. It is also suggested for other factors such as social influence and facilitating conditions to be considered in determining the users' adoption in future.



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REFERENCES

- Al-Azawei, A., Parslow, P., & Lundqvist, K. (2017). The Effect of Universal Design for Learning (UDL) Application on E-learning Acceptance: A Structural Equation Model. *The International Review of Research in Open and Distributed Learning*, 18(6).
- Briz-Ponce, L., Pereira, A., Carvalho, L., Juanes-Méndez, J. A., & García-Peñalvo, F. J. (2017). Learning with mobile technologies – students' behavior. *Computers in Human Behavior*, 72, 612–620.
- Chen, H., Rong, W., Ma, X., Qu, Y. and Xiong, Z. (2017). An extended technology acceptance model for mobile social gaming service popularity analysis. *Mobile Information Systems*.
- Choucri, N., Maugis, V., Madnick, S., Siegel, M., Gillet, S., O'Donnell, S., Best, M., Zhu, H. and Haghseta, F. (2003). *Global E-readiness – For What?* Massachusetts Institute of Technology Cambridge, MA available at: http://ebusiness.mit.edu/research/papers/177_Choucri_GLOBAL_eREADINESS.pdf
- Chuttur, M., (2009). *Overview of the Technology Acceptance Model: Origins, Developments and Future Directions*. Indiana University. Working Papers on Information Systems. available at: <https://s3.amazonaws.com/academia.edu.documents/35301794/TAMReview.pdf?response-content>
- Davis, F. D. (1989). Perceived Usefulness, Perceived Ease of Use, and User Acceptance of Information Technology,” *MIS Quarterly* (13:3), 319-339.
- Davis, F.D, Bagozzi, P R ,Warshaw P. (1989). User acceptance of computer technology: A comparison of two theoretical models, *Management Science*, 35, 982-1003.
- Hamid, N.A.,Haron, N. H., Abdullah, N.A.N., Ali, M.M., Hamid, N. A. (2020). The Effectiveness of the eRezeki Digital Platform in Kuala Selangor, Malaysia. *International Journal of Innovation, Creativity and Change*, 10 (11), 746 -758.
- Haug, A., Pedersen, S.G., Arlbjorn, J.S (2011), IT readiness in a small and medium-sized enterprises. *Industrial Management and Data Systems*, 111 (4), 490-507.
- Isaac, O., Abdullah, Z., Ramayah, T., Mutahar, A. M., Alrajawy, I., (2016). Perceived Usefulness, Perceived Ease of Use, Perceived Compatibility, and Net Benefits: An Empirical Study Of Internet Usage Among Employees In Yemen . 7th international conference on postgraduate education, 899 -919.
- Kristensen, S, M. (2016). *Understanding factors influencing danish consumer; intention to use mobile paymnet at point-of-sale*. MSc Thesis, Aarhus University.

- Lai, K., & Hong, K. (2015). Technology use and learning characteristics of students in higher education: Do generational differences exist? *British Journal of Educational Technology*, 46(4), 725–738.
- Lee, D. Y., & Lehto, M. R. (2013). User acceptance of YouTube for procedural learning: An extension of the technology acceptance model. *Computers & Education*, 61, 193–208.
- Lee, S., & Kim, B. G. (2009). Factors affecting the usage of intranet: A confirmatory study. *Computers in Human Behavior*, 25(1), 191–201.
- Lee, Y.H., Hsiao, C., Purnomo, S.H., (2014). An empirical examination of individual and system characteristics on enhancing e-learning acceptance.
- Lee, Y., Kozar, K.A., & Larsen, K..R.T (2003). The Technology Acceptance Model: Past, Present, and Future. *Communication of the Association for Information System*. 12(50), 752 – 780.
- Legris, P., Ingham, J., & Collerette P., (2003). Why do people use information technology? A critical review of the technology acceptance model. *Information & Management*. 40 (3), 191-204.
- Lim, G. E. (2019). Unlocking the potential of digital economy. World Bank. 12 April 2019. World Bank Hq, Washington DC. Available at <https://www.treasury.gov.my/index.php/en/gallery-activities/speech/item/5105-speech-unlocking-the-potential-of-the-digital-economy.html>
- Manaf, Z.,A, & Ismail, A., (2009) Malaysian cultural Heritage at risk. A case study of digitalisation projects. *Library Review*. 59 (2), 107-116.
- Mohamed, N., Abdul Karim, S.N., (2012). Open source e-learning anxiety, self-efficacy and acceptance e a partial least square approach. *Int. J. Math. Comput. Sci*. 4, 361-368.
- Muk, A., Chung, C., 2015. Applying the technology acceptance model in a two-country study of SMS advertising. *J. Bus. Res*. 68, 1-6.
- Pallant, J. (2005). *SPSS Survival Manual*. 2nd ed. Sydney : Allen & Unwin.
- Pousheh, A., & Vasquez -Parraga,A.Z., (2018). The role of customer readiness and participation in non-technology-based service delivery. *Journal of Consumer Marketing*. 35 (6), 588-600.
- R. Estriegana, et al. *Computers & Education* 135 (2019) 1–14 12 model (TAM). *Australasian Journal of Educational Technology*, 33(2). Arpaci, I. (2017).
- Radif, M., Fan, I., & McLaughlin, P. (2016). Employment of technology acceptance model (tam) to adopt learning management system (lms) in iraqi universities. *Inted2016. 10th international technology, education and development conference*, 7120–7130.



- Sundram, V. P. K., Bahrin, A. S., Sayuti, N. M. (2016). *Research Methodology*. 1st ed. Malaysia : MLSCA.
- Venkatesh, V., Bala, H., (2008). Technology acceptance model 3 and a research agenda on interventions. *Decis. Sci. J.* 39, 273-315.
- Wu, H., Chang, F. M., Hsu, H., & Chen, M. (2010). Using technology acceptance model and innovation diffusion theory to investigate elementary school student learning intention based on moodle learning platform. *Edulearn10: International conference on education and new learning technologies*.
- Yao, J., & Cao, X. (2017). The balancing mechanism of social networking overuse and rational usage. *Computers in Human Behavior*, 75, 415-422. Available at doi:<https://doi.org/10.1016/j.chb.2017.04.055>
- Yousafzai, S. Y., Foxall, G. R., & Pallister, J. G. (2007). Technology acceptance: A meta-analysis of the TAM: Part 1. *Journal of Modelling in Management*, 2(3), 251–280.