LEARNING EXPERIENCE AND BARRIERS THROUGHOUT OPEN DISTANCE LEARNING MODE: A CASE STUDY OF UITM PAHANG STUDENTS

Noor Hasimah M Yacob[1*], Nur Syazwani Mohammad Fadzillah[2], Nor Hawani Wan Abdul Rahman[3] , Lily Mazlifa Mustafa[4], Sabariah Jamaluddin[5], Anis Barieyah Mat Bahari[6]

[1-6]Faculty of Accountancy
Universiti Teknologi MARA UiTM Pahang, 26400 Bandar Jengka
noorhasimah@uitm.edu.my

Abstract

Due to the pandemic of Covid19, UiTM moved all classes to online and distance learning (ODL) mode effective from April 13, 2020 for all its campuses. This sudden change made all the lecturers and students felt difficult and unsure of being able to continue the teaching and learning process throughout ODL mode. However, the academic session must be continued to ensure that the students still can learn, and they can graduate on time. Therefore, this paper aims to study the learning experience of the students and barriers faced throughout the ODL mode. In achieving the objectives of the study, the data were gathered from a set of questionnaires distributed to 723 students in UiTM Pahang, Jengka Branch. The study found that most of the students have a good learning experience dealing with their lecturers during the ODL. However, they have faced several barriers that may lead to dissatisfaction with online learning such as time management, stress and tired, lack of family support, difficulties of students to understand the lesson taught, or materials provided by the lecturers. Only a few of them having a problem with internet and device performance, in term s of technology skills, majority of them were not experts in using Learning Management System (LMS). The result of the study might be used by respective authorities to improve the guidelines regarding the ODL process in the future. Further study should be conducted to see the impact of online learning barriers to their academic performance.

Keyword: Open distance learning, learning experience, learning barriers

Introduction

The coronavirus disease 2019 (Covid-19) outbreak has impacted businesses of all sizes and industries of various kinds. The higher education sector is not exempted. Almost all the world, and including the Malaysian higher education ministry, has issued the ordered to close the public school and higher education closure as an emergency measure to stop spreading the infection (Shahzad et al. 2020). Therefore, since the beginning of the Movement Control Order on 18 March 2020, campuses throughout Malaysia have been empty. In Malaysia, the Ministry of Education has instructed all the public and private universities to start with online learning to mitigate the pandemic (COVID-19). In effect to this situation, all universities in Malaysia including Universiti Teknologi MARA (UiTM) are urged to immediately adapt to

this new norm (Chung et al., 2020) and to conduct online learning until the end of December 2020 (Malaysian Ministry of Higher Education, 2020).

UiTM has started open distance learning (ODL) to all students on 13 April 2020. As cited by Maphosa and Bhebhe (2020), UNESCO (2002) defines Open and Distance Learning (ODL) as the opening access to education and training provision, delivering learners from the limited time and space, and offering flexible learning opportunities. With the implementation of ODL, the learning processes are shifted from traditional modes or partial face-to-face meetings to fully virtual classroom modes.

Past researches on online learning covered many areas such as motivation of the students (Al Rahmi et al. 2018; El-Seoud et al. 2014), barriers faced by the students during the online learnings (Qifu 2013), the performance of the students on online classes (Elfaki et al. 2019; Abdul Halim et al. 2018). Besides, Baker & Unni (2018) focused on the comparison in the performance of the students based on online class and face to face classes. However, none of this research studies the experiences and barriers of the students when the face to face class was immediately changed to online classes. Therefore, this study is important because the experience of the students who are familiar with the face to face classes was forced to adapt to online classes will produce new findings as compared to previous studies. In this situation, the students maybe not ready for the online classes and therefore we need to know the barriers faced by the students during the online sessions. Thus, this paper aims to study the learning experience of the students and barriers faced throughout the ODL mode. The result of the study might be used by the respective authority to improve the guidelines regarding the open and distancing learning process in UiTM in the future.

Literature Review

Online learning environments require the use of various technology and media, where students access lecture materials through their computers, tablets, or cell phones (Alghamdia et al. 2020). Embi et al. (2011) stated that 54.2% of students in Malaysian higher education institutions accessed their online courses through laptop/netbook. Some of the lecturers prefer to use synchronous learning using Zoom, Google Meet or Webex, but many of them prefer to choose other more user-friendly and free media such as Google Classroom, and other social media such as WhatsApp, Telegram, and YouTube (Chung et al., 2020). There are many positive impacts from online learning such as flexible time to study (Bujang et al., 2020, Ana et al., 2020, Yee and Ean, 2020), boost self-confidence by voicing out their opinions (Yee and Ean, 2020), able to work independently with their study (Yee and Ean, 2020, Maphosa and Bhebhe, 2020 and Chung et al, 2020), self-efficacy in technology (Bujang et al., 2020) and able to develop self-motivation to learn (Ana et al., 2020 and Yee and Ean, 2020).

However, students may also be facing challenges and barriers while carrying out online learning processes. Barriers are defined as something that prevents a process from being complete or running smoothly (Abd Aziz et al., 2020). Some of the barriers in the learning environment include technical issues, complexity, sequencing of activities, lack of time management skill, lack of support or assistance if they do not reach out or make their issues known to the lecturer and varying internet capabilities and speed, (Swan, J. G., 2017). Also, those with limited choice in the delivery mode because challenges in the online space and limitations of specific Learning Management System (LMS) and personal factors, such as

family commitment, cannot control personal emotion, caring for young children/siblings and being called into work restrict their ability to engage in alternative and preferred face to face or blended learning model (Stoessel, et al., 2015). Technology skill is also one of the barriers in online learning as stated by Abd Aziz et al. (2020), the lack of technical skill will make online learning difficult and cannot achieve the objective. Sulaiman (2014) have defined technology skill involves computer skills, online skills, and computer application literacy.

Method

To conduct this study, data were collected using the questionnaire form. The questionnaire was developed based on previous studies with slight modifications to achieve the research objectives. The questionnaire is divided into four sections, sections A, B, C, and D. Section A consists of questions related to demographic information of respondents. Section B contains questions related to barriers faced by the students throughout ODL mode. Besides, Section C contains questions related to students' experience in the learning process while Section D consists of questions related to students' experience during the final assessment.

The sample consisted of students Universiti Teknologi Mara (UiTM) Pahang who sit for accounting papers. The number of students at UiTM Pahang is 723. The total responses received for this study were 501 representing 69.3% of the total students. For quantitative data analysis, Statistical Package for Social Science (SPSS) version 26.0 was used. Statistical techniques such as "Descriptive Statistic was used to analyze the results of this study.

Result and Discussion

Demographic

The questionnaire was distributed to 723 students from several faculty taking accounting subjects such as the Faculty of Accountancy, Faculty of Applied Science, and Faculty of Business Management. Out of 723 students, only 501 students responded to the questionnaire. The majority of the respondents were from the Faculty of Accountancy with 79.4% (n=398) and 89.6% were diploma students (n=449). It also stated that 45.1% (n=226) and 37.5% (n=188) from semester four and two, respectively. Moreover, 77% (n=386) from the respondents were females and 23% (n=115) were male. The majority of the students (86.8%, n=435) used a combination of handphones and laptops during the ODL mode.

Method Preference During ODL

Figure 1 Methods preference by the students during ODL

Teaching and learning online requires different types of interactions between lecturers and students. Thus, this study aims to identify the students' learning experience about the most preferred methods or platforms used throughout the ODL mode. Most of the students (46.7%, n=234) preferred live chat such as WhatsApp and Telegram as a platform for the learning process. The second preferred platform is Learning Management System such as UFuture and Google Classroom with a percentage of 28.1% (n=141), followed by live online meetings

such as zoom, google meet, and Webex (20.2%, n=101). Low percentages were recorded for the other platforms which indicated that the platforms were least preferred i.e. voice note (2%, n=10), media social (1.4%, n=7), and email (1.2%, n=6).

Experience in learning

Figure 2 summarizes the responses to the Likert scale questions regarding the students' learning experience throughout ODL mode. Most of the students agreed with their lecturers, with 48.5% (n=243) saying that their lecturers helped them to facilitate the learning process online. Half of them (50.1%, n=251) agreed that their lecturers monitored the assignments given to them, while 48.3% (n=242) agreed that their lecturers provided adequate guidance during an online class. However, 37.1% of the students (n=186) neither agreed nor disagreed that they were happy and comfortable with the ODL mode. 36.3% of them (n=183) also neither agreed nor disagreed to proceed with the ODL mode in the future. Eventually, 38.9% of the students (n=195) did not sure whether they managed to involve in learning online successfully or not.

Figure 2 Summary of students' learning experience during ODL

Experience in Final Assessment

Figure 3 summarizes the responses to the Likert scale questions regarding the students' experience in the final assessment. 41.4% of the students (n=206) neither agreed nor disagreed that they were ready enough to do the final assessment online. However, almost half of them (46.7%, n=234) agreed that their lecturers gave clear instructions on the online final assessment process. 36.9% of the students (n=185) neither agreed nor disagreed that the time given to upload the answer script was enough. Eventually, 42.3% of them (n=212) did not sure whether they were satisfied with the final assessment process or not.

Figure 3 Summary of students' experience during the final assessment

Barriers to online learning

For the study, barriers are categorised into three categories, namely internal barriers, externals barriers, and technology barriers. Internal barriers are referring to the student internals' problem and are classified into several aspects such as time management, interest in learning, stress, tired, sleep problem, appetite problems, level of confidence, concentration, emotion, and health problem. External barriers are more on factors that cannot be controlled by the students such as family, lecturer, and friend. Meanwhile, technology barriers have been grouped into five issues such as internet status, internet data, computer skills, and device performance.

Internal barriers

This study aspires to identify the internal barriers faced by the students during the ODL. The respondents have been asked about the rate of occurrence of the internal barriers that happened during the ODL process as shown in Figure 4. Based on the result in 'sometimes' and 'almost everyday' frequency, we can conclude that the main internal barriers faced by the students are poor time management, stress, and tiredness. Half of the respondents chose sometime for poor time management barriers which is 52.1% (n = 261) and 5.4% (n = 27) chose almost every day. In addition, 40.9% (n = 205) chose 'sometimes' and 24.6% chose almost every day for stress factors. Tiredness barriers also showed similar pattern as nearly half of the respondents chose 'sometimes', with 40.5% (n = 203) and 'almost every day', with 18.8% (n = 94). All these three barriers are important factors in ensuring the ODL process runs effectively and efficiently. This finding is similar to what has been found by Abd Aziz (2020).

Other internal barriers such as concentration, no interest in learning, emotional factors, not enough sleep, and lack of confidence also contributed to the barriers that impede the learning process as it demonstrated a similar pattern with the previous barriers. Although the percentage is higher in the occasional category, it shows that many students faced this problem. In contrast, most of the respondents choose they are not having appetite problems, health problems, and long sleep during ODL which is 44.7% (n= 224), 42.1% (n = 211), and 39.1% (n – 196) respectively.

Figure 4 Summary of internal barriers faced by the students during ODL

External Barriers

Figure 5 illustrates the results from external barriers facing by the respondents during the ODL. The respondents were being asked whether they have a problem with their family, lecturers, and friends. Based on the results, it can be concluded that they did not get full support from their family members which are 55.5% (n=278) is under the category of 'having a problem' and 'seriously having a problem'. 35.5% (n=178) of the respondents chosen having fewer problems with their family and only 9% (n = 45) of them said that they were not having a problem with their family.

The second identified external barriers is a difficulty to understand the lesson taught or the materials provided by the lecturers. 41.9% (n=210) of the respondents stated that they have less problem, 26.1% (n=131) have a problem and 5% (n=25) have a serious problem in understanding the lecture. This issue may lead to poor performance and learning quality. Moreover, some of the students having a problem adapting themselves to the ODL situation. In total, 22% (n=110) having a problem and serious problem, meanwhile 36.1% (n=188) on a middle-range which is less problem. Only 9.6% (n=48) and 7.2% (n=36) of the respondents having a communication problem with their lecturers and friends, respectively. Overall, the respondents do not have a problem with their lecturer in terms of guidance, monitoring, download, and uploading materials, and attending the online class.

Figure 5 Summary of external barriers faced by students during ODL

Technology Barriers

Figure 6 implies the results from the response in the questionnaire regarding technology barriers. It is indicated that the majority of them have moderate internet status with 43.7% (n=219). In addition, 36.1% (n=181) of them have a good internet connection and 15.5% (76) have an excellent connection. Only 5% (n=25) have the worst and bad internet connection. Therefore, internet status is not the main barrier under technology barriers. Similarly, internet data and device performance also revealed the same results whereby most of them are not having a problem with their data and device used in the ODL process. Only 11.6% (n=58) and 12.6% (n=63) of them have problems with data and device performance.

Under technology barriers, we also look at whether the respondents having a problem in using their device and LMS such as Google Classroom, UFUTURE, Microsoft Team for ODL purposes. In total, 64.1% (n=321) declared that they were not having a problem is using their device for ODL. As discussed in the previous part, the majority of them used a handphone and laptop during the ODL. However, in terms of skill, the majority of them were not expert in using LMS. 38.1% (n=191) and 12.6% (n=63) stated that they were having a problem and serious problem, respectively, in using LMS. This may be due to it is the first time they were involved in online learning and they were not familiar with the system.

Figure 6 Summary of technology barriers faced by students during ODL

Causes of the barriers

A set of questions regarding the causes of the barriers was given to the students to see whether those causes contribute to their barriers or not. Based on the result of this study as presented in Figure 7, we found that 51.5% of the students (n=258) having barriers to engage with the ODL mode because of time limitation. This is because they need to allocate their time to study and doing house chores. Besides that, 62.7% of them (n=314) having barriers due to commitment to family. Some of the students have to do a part-time job to support their family especially those who were affected throughout the movement control order period. However, less than half of the students having barriers due to less exposure to technology, not ready to adapt with ODL mode, incompetent device, limited data, and health problems. The percentage of the students were 12.2% (n=61), 29.5% (n=148), 22% (n=110), 39.5% (n=198) and 6.2% (n=31) respectively. Apart from that, students have also been asked about the other causes. The causes given by the students were weak internet connection, uncomfortable environment, lack of support from family, and financial problems.

Figure 7 Summary of causes to the barriers

Conclusion

This paper is concerned to study the learning experience of the students and barriers faced by the students throughout the ODL mode. The most preferred method chosen by the students was online class through live chat such as WhatsApp and Telegram followed by Learning Management System platforms such as UFUTURE and Google Classroom compared to other online platforms. This result is in line with the findings found by Chung et al. (2020).

Concerning assess students' experience in learning through ODL mode, the lecturers have played significant roles and efforts in ensuring the ODL mode to be done effectively and efficiently. This may due to it is the first time that teaching and learning to be conducted in full online instead of face to face class, the lecturers have to put their very best efforts to ensure ODL mode can be done and knowledge can be transferred to the students successfully.

Time management, stress, and tiredness are among the internal barriers identified. The causes due to difficulties in managing time for their study and house chores. A few students have to do a part-time job to support the family and at the same time, they have to engage with ODL mode especially those families were being affected by MCO. As consequence, they feel stress and tired. It is suggested that the students may need to come out with their self-study schedule to ensure that ODL mode can be done in comfortable means and systematically. External barriers such as lack of family support and difficulties of students to understand the lesson taught or materials were being provided by the lecturers are the external barriers revealed. The students should take action to have better communication between parents, family members, and lecturers to smooth out the process of ODL mode.

Although the students did not have issues with the technology barriers such as internet status, data, and device performance, it is wise for ODL online platforms such as LMS, UFUTURE to be upgraded in its processing time speed especially during peak time. The system should be stable and supportive during the ODL mode process.

However, this study has a limitation. First, the majority of the respondents in this study are small in numbers particularly in UiTM Pahang where the result cannot be generalized for the whole population of students in Malaysia. Next, this is a cross-sectional study where the responses and results may be biased in different time frames and respondents. Also, this study may shed some area for further study to see the relationship and the impact between the barriers of students' experience in learning during ODL mode to their academic performance.

References

Abd Aziz, N. A., Musa, M. H., Abd Aziz, N. N., Abdul Malik, S., & Mohamad Khalid, R. (2020). A study on barriers contributing factor to an effective online learning among undergraduates' students. *Open Journal of Science and Technology*, *3*(1), 17-23.

Abdul Halim, H. (2018). Investigation on student accessing information for ICT-learning approaches. *Global Business and Management Research: An International Journal, 10*(3), 473-485.

Al-Rahmi, W. M., Alias, N., Othman, M. S., Alzahrani, A. I., Alfarraj, O., Saged, A. A., & Abdul Rahman, N. S. (2018). Use of e-learning by university students in Malaysian higher educational institutions: A case in Universiti Teknologi Malaysia. *IEEE Access*. *6*, 14268-14276. https://doi.org/10.1109/ACCESS.2018.2802325

Alghamdia, A., Karpinskib, A. C., Leppb, A., & Barkleyc, J. (2020). Online and face-to-face classroom multitasking and academic performance: Moderated mediation with self-efficacy for self-regulated learning and gender. *Computers in Human Behavior*, *102*(1), 214-222.

Ana, A., Minghat, A. D., Purnawarman, P., Saripudin, S., Muktiarni, M., Dwiyanti, V., & Mustakim, S. S. (2020). Students' perceptions of the twists and turns of e-learning in the midst of the covid 19 Outbreak. *Romanian Journal for Multidimensional Education/Revista Romaneasca pentru Educatie Multidimensionala*, *12*(1), 15-26.

Baker, D. M.A. & Unni, R. (2018). USA and Asia hospitality & tourism Students' perceptions and satisfaction with online learning versus traditional face-to-face instruction, *e-Journal of Business Education & Scholarship of Teaching*, *12*(2), 40-54.

Bujang, S. D. A., Selamat, A., Krejcar, O., Maresova, P., & Nguyen, N. T. (2020). Digital learning demand for future education 4.0 - Case studies at Malaysia education institutions. *Informatics*, *7*(2), 13.

Chung, E., Subramaniam, G., & Christ, D. L. (2020). Online Learning Readiness Among University Students in Malaysia Amidst Covid-19. *Asian Journal of University Education, 16*(2), 45-58.

Elfaki, N.K., Abdulraheem, I., & Abdulrahim, R. (2019). Impact of e-learning vs traditional learning on student's performance and attitude. *International and Medical Research and Health Sciences, 8*(10), 76-82.

El-Seoud, M. S. A., Taj-Eddin, I. A. T. F., Seddiek, N., El-Khouly, M. M., & Nosseir, A. (2014). E-learning and students' motivation: A research study on the effect of e-learning on higher education. *International Journal of Emerging Technologies, 9*(4), 20-26.

Embi, M. A., Abdul Wahab, Z., Sulaiman, A. H., Atan, H., Ismail, M., & Mohd Nordin, N. (2011). e-Learning in Malaysian higher education institutions: Status, trends & challenges. *Department of Higher Education, Ministry of Higher Education Malaysia*. Kuala Lumpur, Malaysia.

Malaysian Ministry of Higher Education. (2020). *Press release by the Malaysian Ministry of Higher Education*, *retrieved from* https://www.mohe.gov.my/en/media-mohe/press-statement/1126-pengendalian-aktiviti-akademik-di-kampus-institusi-pendidikan-tinggi-semasa-dan-pasca-perintah-kawalan-pergerakan.

Maphosa, C., & Bhebhe, S. (2020). Interrogating the concept 'openness'in open distance learning (odl). *European Journal of Open Education and E-learning Studies*, *5*(2), 33-46. http://dx.doi.org/10.46827/ejoe.v5i2.3282.

Qifu, W. (2013). A study of barriers to online learning in distance education in China. EdD thesis, University of Nottingham. Access from the University of Nottingham repository: http://eprints.nottingham.ac.uk/28966/1/601804.pdf.

Shahzad, A., Hassan, R., Aremu, A.Y., Hussain, A., & Lodhi, R.N. (2020). Effects of covid-19 in e-learning on higher education institution students: The group comparison between male and female. Published online 4 Aug 2020. Springer. https://link.springer.com/article/10.1007/s11135-020-01028-z

Stoessel, K., Ihme, T. A., Barbarino, M. L., Fisseler, B., & Stürmer, S. (2015). Sociodemographic diversity and distance education: Who drops out from academic programs and why?. *Research in Higher Education*, *56*(3), 228-246.

Sulaiman, F. (2014). Online learning in higher education in Malaysia: A case study of students' future expectations. *International Journal of Humanities and Social Science, 4*(8), 124-128.

Swan, J.G. (2017). The challenges of online learning supporting and engaging the isolated learner. *Journal of Learning Design. Special Issue: Business Management, 10* (1), 20 - 30.

Yee, S. L. W., & Ean, C. L. C. (2020). Malaysian private university students' perception of online discussion forums: A qualitative enquiry. *Sains Humanika*, *12*(2).