



available at http://jurnalfahum.uinsby.ac.id/index.php/nobel/article/view/344





DOI: 10.15642/NOBEL.2021.12.1.43-59

REVEALING HIGHER EDUCATION STUDENTS' READINESS FOR ABRUPT ONLINE LEARNING IN INDONESIA AMIDST COVID-19

Arum Nisma Wulanjani^{1⊠}, Lilia Indriani²

Universitas Tidar, Jl. Kapten Suparman 39 Potrobangsan, Magelang Utara, Central Java, Indonesia^{1,2}

Article Info

Article History: Received October 2020 Accepted November 2020 Published April 2021

Keywords: COVID 19 pandemic; abrupt; online learning; students' readiness; OLRS

Abstract

COVID 19 pandemic has influenced many sectors, including education. The outbreak hinders teaching and learning activities, which have usually been carried out in a face-to-face meeting. In Higher Education, online learning becomes a crucial need to keep the teaching and learning going on. It has been a sudden shift for students of the English Education Study Program at Tidar University to have online teaching and learning throughout the whole semester. This study explores the students' readiness for online learning and investigates the aspect that tangles their online learning. A total of 188 students, from first-year students to senior students, participated in this study. The Online Learning Readiness Scale (OLRS) and interview were used to appraise the students' readiness for online learning. Internet selfefficacy, self-directed learning, learner control, motivation for learning, and online communication self-efficacy were assessed. The result of the scale revealed that the students were at a moderate level of online learning readiness. The highest contribution to their readiness was from their motivation for online learning. Moreover, surprisingly, the biggest challenge was the learner control. They were mainly distracted by other online activities during their online learning. Also, conducting online learning needs to involve various technologies and more structured activities to enhance their readiness.

©2021 UIN Sunan Ampel Surabaya

[™]Correspondence: Email: arum_nisma@untidar.ac.id p-ISSN 2087-0698 e-ISSN 2549-2470

INTRODUCTION

Since the first quarter of 2020, Covid-19 has become a pandemic worldwide. Once the World Health Organization (WHO) announced Covid-19 as a global pandemic, the world rushed to cover all potentials, which resulted in the addition of positive patients Covid-19, including the cessation of public activities, social or physical distancing, and a lockdown announcement (Chavez et al., 2020). The cessation includes the demand for working and learning from home. These kinds of situations hit the education system in some affected countries, and Indonesia is no exception. The government has made drastic changes to adjust the teaching and learning process. All students at the early childhood education level up to the higher education level were forced to change their regulations in distance learning (Churiyah et al., 2020). The implementation of distance learning by engaging the use of technology is noted in carrying out the teaching and learning activities in a structured manner in which there is normal, substantive, and supportive communication or relationships between students and teachers (Bozkurt et al., 2015; Buselic, 2012; Griffiths, 2016).

Furthermore, online learning emphasizes the synchronous and asynchronous models which offer internet-based learning. In conducting synchronous learning, students and teacher are engaged in direct interaction through any online media. Meanwhile, in asynchronous learning, students and teachers are not engaged directly at the same time (Rasmitadila et al., 2020). Practically, in higher education, online distance learning could take shape as the flipped classroom, hybrid, mixed asynchronous-synchronous, and all asynchronous learning. For sure, the application of distance or online learning needs the involvement of the internet and technology use. It seems that technology takes over online learning, but teachers and students' role goes beyond the appearance of technology. Online learning does not stop only at the use of technology, but it emphasizes how students connect with content, instructors or teachers, and other students; to acquire information and advance through learning experience (Eko et al., 2020).

It is undeniable that online learning has brought many benefits to education, as postulated by some online researchers (Aljawarneh, 2020; Alomyan, 2017; Eko et al., 2020; Linjawi & Alfadda, 2018). However, the most troubling is the unresolved issue of online learner retention rates (Doe et al., 2017). Smith (2010) also found out that more than 40% of students of online students appear to break off of online classes in total. Besides, Doe et al. (2017) mention that technology can facilitate social exchange. Still, ultimately social experiences are essential for the emotions of the students, not technology. In essence, the emotional experience affects. The emotional experience, in turn, influences how actively the learner engages. In conclusion, one

significant factor that cannot be overlooked in any online attrition rate discourse is how ready students for online learning.

In line with the previous proofs, students' readiness to use technology was one of the most prominent keys to successfully conducting online learning in Indonesia during the COVID-19 pandemic (Hasani et al., 2020). They found that students' readiness is a predictor of online learning. Students' self-competence, which refers to students' self-efficacy in ICT, is one of the success keys of online learning. In line with (Chung et al., 2020), the more confidence the students in using ICT will enhance their readiness to complete their online learning. Readiness is a potent factor in the effective implementation of e-learning. The most critical readiness factor in this context is the readiness of students, professors, and technology. The attitude of individuals, especially learners, is also a key factor determining how online learning could be conducted successfully (Ali, 2010; Rasouli et al., 2016).

Thus, a teacher needs to examine students' readiness to conduct online learning. Most researchers used Online Learning Readiness Scale (OLRS) proposed by (Hung et al., 2010). Five aspects are being concerned, such as computer/internet self-efficacy, self-directed learning, learner control, motivation for learning, and online communication self-efficacy.

Many investigations mentioned previously highlighted the importance of assessing students' readiness for online learning. There are still limited related studies that explore more in which aspect of readiness students encounter difficulty in enhancing their readiness and abrupt online learning for higher education in Indonesia. As Kementerian Pendidikan dan Kebudayaan Republik Indonesia (Mendikbud/Ministry of Education and Culture) (cited in Eko et al., 2020) has announced, the COVID-19 pandemic results in the usual direct full face-toface learning in the classroom switch to an online learning setting, which probably will last until the end of the semester. Having full online learning throughout the semester is a new challenge for both the teachers and the students. In line with the situation above, the English Education Study Program students at Tidar University, Indonesia, have impacted an abrupt adoption of the learning system. They were forced to shift their learning routines from flipped and blended or hybrid learning to fully online learning for the whole semester. That was such an abrupt shift for the students to adjust themselves to promote their learning achievements. By focusing on the students' readiness for abrupt online learning, this study investigates their readiness covering the five aspects proposed by Hung et al. (2010) and which aspect becomes a nuisance for the students during the abrupt online learning. Regarding the indefinite condition of the COVID 19 pandemic in Indonesia, resolving aspects that become a burden for the students on online learning is crucial in this study to promote online learning success.

REVIEW OF LITERATURE

Teaching Amidst the Covid-19 Pandemic

COVID-19 outbreak has changed educational institutions in many countries, from elementary to university, in how they educated their students. As one of the countries that the outbreak has impacted, Indonesia has also faced a sudden shift in education. From the government, stakeholders, educational institutions, teachers, and students must work together to find ways to face the shift due to the COVID-19 pandemic (Fansury et al., 2020). Finding the best way to keep the teaching process going on is such a challenge during the pandemic. Having such conventional or face-to-face learning has no longer become a possible option during the pandemic. A global shutdown for educational institutions has been announced to prevent the spread of the virus.

Through the Ministry of Education and Culture, the government then issued education policies to conduct SFH or school from home (Churiyah et al., 2020) and move the conventional classroom to an online classroom (Agung et al., 2020). The need to conduct online learning has been considered one solution to keep the teaching and learning process. This policy has urged teachers to change the way they teach. They need to adapt quickly to facilitate their students through methods and strategies for online learning continuity. Choosing online learning amidst the pandemic era is one of many considerations to provide students a meaningful learning experience instead of burdening them with the demands of achieving all curriculum requirements during the learning process in the pandemic era (Rasmitadila et al., 2020).

Online Learning

The Indonesian government has changed education policies during the pandemic era and has turned the implementation of teaching and learning in all educational institutions. Instead of experiencing academic losses, the students have to accept the sudden shift in how they learn from conventional to an online classroom. While it was not new to change to the education field but to embrace online learning, it was very sudden to replace the conventional learning method (Mohalik & Sahoo, 2020). Indeed, the teachers and the students need to adjust themselves quickly to survive in conducting and joining online learning. In line with Chung et al. (2020), they agreed that the "online movement" is the largest and the most vital shift in education.

Online learning is a learning model that highlights the involvement of the internet. Online learning is one type of distance learning in which education occurs over the internet. Furthermore, online learning has become the most popular approach, which continues to grow

fast over the past decade (Wan Husin et al., 2016). Wan Husin et al. (2016) also state that one of the reasons for its popularity is flexibility. It allows teachers to utilize various software and media to construct and deliver their courses in online learning. Its flexibility further facilitates learning to be held synchronously and asynchronously (Rasmitadila et al., 2020).

Although there are many challenges in conducting online learning, online learning provides bunches of flexibility. Moreover, most students preferred online learning due to its flexibility in learning, time management, and access (Smith et al., 2019). Students' preference for online learning can indicate that online learning positively impacts their learning achievement. Students' positive experience has a significant role in their learning success since it influences how effective learning has been conducted to achieve learning outcomes (Azis et al., 2019). All the condition above has concluded that online learning is the best approach to adopt to assure the continuity of education in Indonesia during the pandemic era (Rasmitadila et al., 2020).

Student's Readiness in Online Learning

Online learning provides multilayers challenges both for teachers and students. In conducting successful online learning, there are, of course, many circumstances that need to fulfill. Students' readiness in online learning has appeared as a significant factor affecting online learning success. Through the years, many studies have been conducted around online learning readiness among higher education students (Al-Said, 2015; Chung, Noor, et al., 2020; Dray et al., 2011; Hung et al., 2010; Linjawi & Alfadda, 2018; Hasani et al., 2020; Neupane et al., 2020). Their studies reveal that students' readiness has a significant role in facilitating their successful online learning. Students' readiness covers both technical skills and their attitudes toward online learning.

Furthermore, students' technology-related skills and attitudes toward online learning lead them to meet learning goals and expectations (Händel et al., 2020). In assessing students' readiness in online learning, Hung et al. (2010) proposed five dimensions covering students' skills in the use of the internet, students' skills in online communication, students' self-directed learning, students' control in online learning, and also students' motivation in online learning. He suggests that teachers need to give special attention to those dimensions in conducting online learning. Preparing students to join online learning helps them experience positive and successful online learning. Teachers need to utilize students' readiness in online learning to ensure they can carry out online learning (Churiyah et al., 2020).

Most of all, having a sudden shift from the conventional classroom to online learning for the whole semester is such a shock for Indonesian students. Thus, this study tried to assess students' readiness towards online learning to give significant evidence for the stakeholders in educational institutions to delve deeper into the quality of online learning they have conducted to improve it for the continuity of online learning during the pandemic era.

METHOD

Research Design

A qualitative research design was applied in this study. It applied a case study method. This research described a specific condition of specific participants in-depth analysis. This method explained a specific learning or teaching process or research environment (Vance et al., 2016).

Participants

There were 188 students engaged actively in this study as the participants. They were the students of the English Education Study Program at Tidar University. From first-year students to senior students took part in this study.

Data Collection

The Online Learning Readiness Scale (OLRS) proposed by (Hung et al., 2010) was employed as the main instrument to gather the data in this study. The scale has five main dimensions: computer/internet self-efficacy, self-directed learning, learner control, motivation for learning, and online communication self-efficacy. Those five main dimensions covered a total of 18 sub-dimensions. The instrument has been validated by Hung et al. (2010) and confirmed by Chung et al. (2020). The scale for readiness can be seen in table 1.

As shown in Table 1, five dimensions should be assessed to assess students' readiness in online learning. Furthermore, each dimension has its sub-dimensions, which can indicate students' readiness achievement online learning. The researcher used a 4-point Likert scale in which there is no neutral option. Ideally, a good scale for researchers uses the 4 point scale to get specific responses (Munshi, 2014). The Likert scale had options such: strongly disagree, disagree, agree, and strongly agree. An open-ended interview was conducted for secondary data to understand the students' nuisance faced during online learning.

Table 1. Online Learning Readiness Scale Dimensions

Main Dimensions	Sub-dimensions
1. Computer/Internet Self-	CIS1: Feeling confident in using ICT.
Efficacy	CIS2: Feeling confident in managing ICT for online learning.
	CIS3: Feeling confident in using ICT to find or gather information
	for online learning.
2. Self-directed Learning	SDL1: Executing the study plan.
	SDL2: Seeking help for solving problems
	SDL3: Handling time well

		SDL4: Preparing learning goals
		SDL5: Expecting higher performance
3.	Learner Control (in an	LC1: Managing learning progress
	online context)	LC2: Being distracted by other online activities
		LC3: Repeating online instructional materials
4.	Motivation for Learning	MFL1: Having enthusiasm for new ideas.
	(in an online context)	MFL2: Having the desire to learn
		MFL3: Progressing from their mistakes.
		MFL4: Sharing ideas with others
5.	Online Communication	OCS1: Feeling confident in using online learning technologies
	Self-Efficacy	OCS2: Feeling confident in expressing themselves through text
		OCS3: Feeling confident in posting questions or responses

Source: (Hung et al., 2010)

Data Analysis

The Likert scale used in this research ranged from 4 points as the highest and 1 point as the lowest. After collecting the points from the questionnaire, the mean of each dimension was then calculated and determined to represent the specified sub-dimension readiness levels. The readiness scale was then put as follows:

Table 2. Students' Readiness Scale Level

Mean value	Level
1 - <2	Low
2 - <3	Acceptable/ Moderate
<3 - 4	High

Adapted from Linjawi & Alfadda (2018)

The interview was conducted online. The researcher posted the questions on a certain Learning Management System (LMS) or platform, and then the students were asked to record their answers and posted to the platform. By considering the five dimensions in OLRS, the students were asked about their experience during online learning. The questions covered their experience using the internet or various online learning platforms, performing and completing activities or tasks using ICT, the activities conducted in online learning, and their biggest challenge.

Descriptive analysis was then generated for data reporting, including for the interview results. The data were then displayed in charts. A broader and deeper meaning of the data analysis was then exposed by data triangulation to bring up the significance of the problem and contradictory ways of viewing it.

RESULTS AND DISCUSSIONS

Students' Online Learning Readiness

The mean of each dimension of OLRS was calculated to find out how ready the students in participating the online learning. These five dimensions were computer/internet self-efficacy, self-directed learning, learner control, motivation for learning, and online communication self-efficacy. The overall students' online learning readiness can be seen in the chart below:

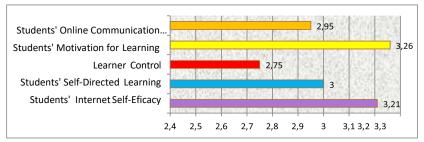


Figure 1. Overall Students' Online Learning Readiness

From Figure 1, it can be seen that the students' mean scores varied between 2.75 to 3.24, and the range shows that there was a nearly wide range from moderate to high level of readiness for online learning. The result above revealed that the students had the highest level of readiness in the motivation for learning (ML) dimension. Their motivation for online learning shows the highest level of all. On the other hand, they had the lowest mean score in the learner control dimension. With the mean score of 2.75, their ability to control their online learning dropped at a moderate or acceptable level. The more detailed result of each dimension was presented in the figures below:

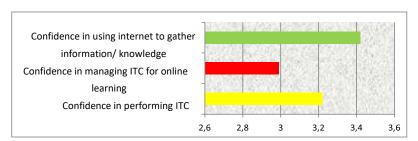


Figure 2. Students' readiness in computer/ internet self-efficacy

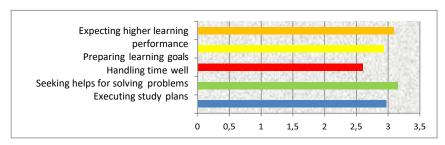


Figure 3. Students' readiness in self-directed learning

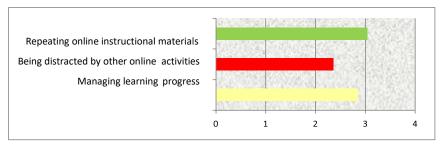


Figure 4. Students' control in online learning

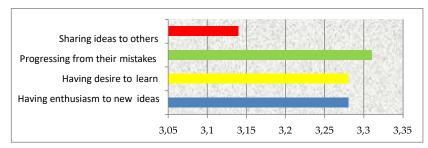


Figure 5. Students' motivation for online learning

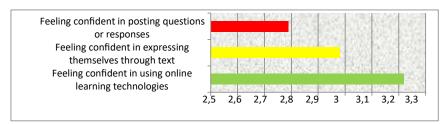


Figure 6. Students' Online Communication Self-Efficacy

Each figure above represents the students' readiness for each sub-dimension. In the figures, the red color signs the lowest mean from each sub-dimension. The figures revealed that in some sub-dimension, the students faced a nuisance during online learning. The lowest mean level was the students' readiness to control their online learning. The mean was only 2.3. They had difficulties in managing their online learning from other online activities distractions. On the contrary, the students had the highest readiness to use the internet to gather information or knowledge for their online learning. It was proven by the mean score for its sub-dimension, which reached 3.42 out of 4.00. Their readiness in this sub-dimension was at a high level. The overall result shows that the students' readiness for online learning was high, proven by the mean, which reached 3.03 out of 4.00.

The Interview Results

The interview results were concluded into four mainframes. They covered: their experience in using the internet or various online learning platforms, performing and completing activities

or tasks by using ICT, the activities conducted in online learning, and also their biggest nuisance on online learning. From then on, the result is concluded into four mainframes, as follows:

Most of the students did not face any difficulty in using the internets. They quickly adapted to use any online resources to gather the information they needed for their online learning. Some of the interview results were as follows:

"I agree with technology learning; it adds new knowledge and experience. Using technology or other learning media makes me more interested and passionate about learning. My suggestion is better to use learning media like Google meet because if you use Google meet, everyone can listen well, if only in love videos or material. There might be something that is not paying close attention."

"As we have to face online learning, we truly need to keep maintaining our learning English motivation. I love the quiz and assignments given, especially in listening class, because I know my weakness. I rarely practice my listening skill. In conclusion, I love simple daily listening activity through ELITA."

Most of the students enjoyed using different technologies to perform the activities and also their tasks. Some of them said that it would be more interesting if there are more various technologies used in online learning, including using the game application to support online learning. But on the other hand, they were in trouble with managing their time in online learning. They were overwhelmed in completing tasks or assignments on time. They always asked for additional time to complete their projects. Some of the interview results were as follows:

"I think our learning process so far was excellent, but maybe the lecturer can use the better application, software or website which interaction can occur between lecturers and students there like google meet, etc. Because I think google meet is unique and have a functional interface with a lightweight size and fast, efficient management, user-friendly that all participants can follow."

"I would like to suggest that learning activities use technologies more often. I think that will be more effective. Besides, we can learn many new technologies that we have not known before. Thanks"

"Maybe, lecturers can add a longer deadline for every assignment. Maybe it can help us to do assignments better."

Most students suggested having more interactive communication during online learning; it includes peer to peer and peers to the lecturer. Providing clear instructions and more chances for interactive discussion would help them understand the material given and evaluate their works. Having more various activities would also enhance their interest in participating actively in online learning. Some of the interview results were as follows:

NOBEL: Journal of Literature and Language Teaching Volume 12, Number 1, April 2021, 43-59

"I suggest to the lecturer when the lecturer gives us some assignment or giving some opinion on the forum do not give us time too fast, because we need more time to think and need more time when we want to submit our ideas or opinions."

"My suggestion is whatever the activities are; I hope there will be feedback for us to make sure the correct materials, to make the same perception about the materials, to be an evaluation for our assignment. I think that video explanation and discussion are more effective than just give assignments without explanation. Thank you."

"The role of the lecturer has changed from being a transmitter knowledge, the main source of information, expert material, and the source of all answers become as a learning facilitator, trainer, collaborators, knowledge navigators, and partners learn from controlling and directing all aspects of learning."

"I think the lecturer acted well. The lecturer gave clear instructions and made us more familiar with applications that we had not previously known."

"Lecturers could guide us with the direction that is given to help us understand the materials given and guide us to complete the task according to what is commanded. Lecturers, of course, have a significant role both in the face of faceto-face learning and in online learning as well."

Most students had the same problem avoiding distractions from other online activities, such as opening instant messages (WhatsApp), which does not relate to activities or material in online learning. Moreover, they said they were constantly distracted to browse other online sources that do not relate to the learning instructions. Some of the interview results were as follows:

"I worry about this lesson because sometimes I do not focus on quizzes, too many distractions during online learning."

"I feel the hardest challenge is I need to maintain my focus harder."

Discussion

The findings above revealed that the students generally indicated that they were ready for online learning. They had high readiness for online learning, characterized by the overall readiness mean in 4 factors as 3.03 out of 4, which indicates a high level of online learning readiness. Several images can be drawn from the findings. Firstly, the students have high confidence in using the internets to find online resources in gathering information related to the material given during online learning. Secondly, they found it was challenging to perform the

activities or the tasks assigned by applying various online learning models triggered by their interest in participating in every activity given, which surprisingly leads them to have high readiness in learning motivation dimensions. Those two findings were the most significant contribution to their online learning success.

Surprisingly, the findings stated in the paragraph above are contrary to research results from several researchers (Chung et al., 2020; Ermakova et al., 2017; Linjawi & Alfadda, 2018; Hasani et al., 2020; Mohalik & Sahoo, 2020; Rasouli et al., 2016). They found that computer/internet self-efficacy had an enormous role in contributing to the student's success in online learning. They stated that the students' self-efficacy in operating and using the internets was the most prominent factor affecting students' readiness for online learning activities. Thus, students with more experience and more competence in using the internets are more ready to abruptly adopt distance learning and succeed in their use of online learning. This study reveals that students' motivation in online learning can also promote the success of online learning.

Meanwhile, this study also exposed the biggest challenge in online learning. Besides the internet connection, as always mentioned in many studies related to online learning, it lacked control of their learning. There were too many online distractions during online learning. The students were having difficulty focusing only on online learning. It led them to the delay of assignment submission. It was also found that having asynchronous online learning made them miss the learning schedule and the deadline for task submission. Having some nuisance, especially in controlling other online distractions and managing their time, can negatively affect their online learning. Those distractions led them into dissatisfaction with their online learning performance. This finding is supported by some other researchers, such as (Chung, Noor, et al., 2020; Chung et al., 2020; Linjawi & Alfadda, 2018; Rasouli et al., 2016). In their studies, they found that learner control was such a lack for students during online learning. It was a strong predictor affecting students' readiness for online learning.

Besides the online distraction that became troublesome for the students, each subdimension mean was also revealed that the students still lacked confidence in posting or expressing their questions and opinions in discussion forums. This competence belongs to the Online Communication Self-efficacy dimension. The mean was categorized at a moderate level in the sub-dimension, with the achievement 2.79 out of 4.00. It means that the dimension needs more attention. From the interview result, the lecturer's role had such an effect in triggering and motivating the students to participate more actively in online learning. Getting more clear instructions could help them understand what they should do in online learning. Understanding the instructions given could encourage them to be involved in any activities conducted in online learning. As a result, they would be more confident in participating in any discussion in the forum, asking questions, and even responding to any comments or questions from their friends. This condition is in line with the previous research findings by (Hasani et al., 2020). The other factor that affects students' perceived readiness is uncertainty avoidance or ambiguity. This ambiguity refers to the possible ambiguous and confusing situation that may derive from a poorly structured online course without specific guidance and regular input or feedback from the lecturers in the sense of online learning (Triandis & Hofstede, 1993).

Furthermore, this study also revealed the need to have a personal relationship. Most of the students uncovered that they need more chances to communicate with the lecturers. They need the lecturer to be always ready when they need assistance or explanation. They felt more secure and confident when their lecturer was prepared to assist them whenever they needed help during online learning. This fact was also supported by (Händel et al., 2020; Weidlich & Bastiaens, 2018). They found that rapport with teachers and learning content is highly important for learning and relationships between students and their peers. Students need to engage in human-to-human contact in the online learning environment, establishing personal relationships. Since the chance to interact and communicate directly is hard to fulfill in online learning, the student's presence is crucial for online learning. By noticing their presence, they will experience meaningful learning (Joksimović et al., 2015). Above all, teachers need to be readily accessible online and, if possible, in person for the students to prevent feelings of isolation (Hall & Villareal, 2015; Hunt & Hunt, 2015; Joksimović et al., 2015).

CONCLUSIONS

This study shows an acceptable level of the students' readiness for online learning. From all the five dimensions, three of them were at a high level of readiness. The students have high readiness covering computer/internet self-efficacy, motivation for learning, and online communication self-efficacy. The study revealed that the highest factor contributing to the students' readiness was their motivation in online learning. Their enjoyment triggered their motivation to actively participate and perform various online learning activities by using multiple technologies.

On the other hand, the online distraction took them to an unsatisfying condition in online learning. The students felt it difficult to control themselves from other online distractions, which were not related to the instructions given during online learning. Moreover, they also need a

NOBEL: Journal of Literature and Language Teaching Volume 12, Number 1, April 2021, 43-59

sense of belonging to meaningful learning. Online communication self-efficacy became the other challenge in this study.

To improve students' readiness in online learning, the lecturers need to improve how they construct instructions and activities for online learning. More various activities, technologies, and challenging tasks would be suggested for the lecturers in conducting online learning. Further, building more communication, lecturers to students-students to students, would also be strongly recommended to enhance the students' confidence in online learning.

Future studies should compare online readiness to learn among broader groups of participants, including students from different fields and geographical backgrounds. Students' satisfaction with their online learning also requires further investigation by using multidimensional and wider multi-item instruments. Moreover, a deeper study related to students' experience in online learning, which may impact stakeholders' decisions about how online learning will continue in the future, is necessary to conduct. Conducting a varied deeper study will also help universities develop online teaching and learning to educate learners who can meet the demands of the Industrial Revolution 4.0 era.

Acknowledgments

Financial support for this study was provided by a grant from DRPM (Directorate General of Research and Development Strengthening the Ministry of Research, Technology, and Higher Education). The authors would also like to thank LPPM-PMP UNTIDAR.

REFERENCES

Agung, A. S. N., Surtikanti, M. W., & Quinones, C. A. (2020). Students' perception of online learning during COVID-19 pandemic: A case study on the English students of STKIP Pamane Talino. *Journal of Social Sciences and Humanities*, 10(2), 225–235. DOI: 10.31940/soshum.v10i2.1316

Al-Said, K. M. (2015). Students' perceptions of Edmodo and mobile learning and their real barriers towards them. *TOJET: The Turkish Online Journal of Educational Technology*, 14(2), 167-180. https://files.eric.ed.gov/fulltext/EJ1057371.pdf

Ali, I. E. H. (2010). Measuring Students e-readiness for e-learning at Egyptian faculties of tourism and hotels. *The 6th International Scientific Conference on E-Learning and Software for Education, Bucharest, 2010*(1), 145–154. https://www.ceeol.com/search/article-detail?id=129078

Aljawarneh, S. A. (2020). Reviewing and exploring innovative ubiquitous learning tools in

- higher education. *Journal of Computing in Higher Education*, 32(1), 57–73. DOI: 10.1007/s12528-019-09207-0
- Alomyan, H. (2017). A conceptual framework for web-based learning design. *Proceedings of the International Conference on E-Learning, EL 2017 Part of the Multi Conference on Computer Science and Information Systems* 2017, 191–195. https://files.eric.ed.gov/fulltext/ED579370.pdf
- Azis, Y. M., Suharyati, H., & Susanti, S. (2019). Student's experience of e-learning process and perceived learning outcomes in economic math course. JHSS (Journal of Humanities and Social Studies), 03(02), 67–70. DOI: 10.33751/jhss.v3i2.1458
- Bozkurt, A., Akgun-Ozbek, E., Yilmazel, S., Erdogdu, E., Ucar, H., Guler, E., Sezgin, S., Karadeniz, A., Sen-Ersoy, N., Goksel-Canbek, N., Dincer, G. D., Ari, S., & Aydin, C. H. (2015). Trends in distance education research: A content analysis of journals 2009-2013. *International Review of Research in Open and Distance Learning*, *16*(1), 330–363. DOI: 10.19173/irrodl.v16i1.1953
- Buselic, M. (2012). Distance Learning concepts and contributions. *Oeconomica Jadertina*, 2(1), 23–34. https://hrcak.srce.hr/83575
- Chavez, S., Long, B., Koyfman, A., & Liang, S. Y. (2020). Coronavirus Disease (COVID-19): A primer for emergency physicians. *American Journal of Emergency Medicine*, *3*(2020), 1-10. DOI: 10.1016/j.ajem.2020.03.036
- Chung, E., Noor, N. M., & Mathew, V. N. (2020). Are you ready? An assessment of online learning readiness among university students. *International Journal of Academic Research in Business and Social Sciences*, *9*(1), 301–317. DOI: 10.6007/IJARPED/v9-i1/7128
- Chung, E., Subramaniam, G., & Dass, L. C. (2020). Online learning readiness among university students in Malaysia amidst Covid-19. *Asian Journal of University Education*, *16*(2), 46-58. DOI: 10.24191/ajue.v16i2.10294
- Churiyah, M., Sholikhan, S., Filianti, F., & Sakdiyyah, D. A. (2020). Indonesia education readiness conducting distance learning in Covid-19 pandemic situation. *International Journal of Multicultural and Multireligious Understanding*, 7(6), 491-507. DOI: 10.18415/ijmmu.v7i6.1833
- Doe, R., Castillo, M. S., & Musyoka, M. M. (2017). Assessing online readiness of students. *Online Journal of Distance Learning Administration*, 20(1). 27-37. https://www.westga.edu/~distance/ojdla/spring201/doe_castillo_musyoka201.html
- Dray, B. J., Lowenthal, P. R., Miszkiewicz, M. J., Ruiz-Primo, M. A., & Marczynski, K. (2011). Developing an instrument to assess student readiness for online learning: A validation study. *Distance Education*, 32(1), 29–47. DOI: 10.1080/01587919.2011.565496
- Eko, A., Atmojo, P., & Nugroho, A. (2020). EFL classes must go online! Teaching activities and challenges during COVID-19 pandemic in Indonesia. *Register Journal*, *13*(1), 49–76. DOI: 10.18326/rgt.v13i1.49-76
- Ermakova, Y. V., Demyanenko, N. V., Kurovskii, V. N., Tsepilova, A. V., & Kadochnikova,

- S. A. (2017). The concept of mobile learning of university students when studying foreign language. *Asian EFL Journal*, 2017(97), 108–122. https://asian-efl-journal.com/wp-content/uploads/AEJ-TA-97-January-2017-1.pdf#page=108
- Fansury, A. H., Januarty, R., Rahman, A. W., & Syawal. (2020). Digital content for millennial generations: Teaching the English foreign language learner on Covid-19 pandemic. *Journal of Southwest Jiaotong University*, 55(3). DOI: 10.35741/issn.0258-2724.55.3.40
- Griffiths, B. (2016). A faculty's approach to distance learning standardization. *Teaching and Learning in Nursing*, 11(4), 157–162. DOI: 10.1016/j.teln.2016.04.004
- Hall, S., & Villareal, D. (2015). The hybrid advantage: Graduate student perspectives of hybrid education courses. *International Journal of Teaching and Learning in Higher Education*, 27(1), 69–80. https://files.eric.ed.gov/fulltext/EJ1069791.pdf
- Händel, M., Stephan, M., Gläser-Zikuda, M., Kopp, B., Bedenlier, S., & Ziegler, A. (2020). Digital readiness and its effects on higher education student socio-emotional experiences in the context of COVID-19 pandemic. *Journal of Research on Technology*, 2020(July), 1-29. DOI: 10.31234/OSF.IO/B9PG7
- Hasani, L. M., Adnan, H. R., Sensuse, D. I., Kautsarina, K., & Randy Suryono, R. R. (2020).
 Factors Affecting Student's Perceived Readiness on Abrupt Distance Learning Adoption:
 Indonesian Higher-Education Perspectives. 2020 3rd International Conference on Computer and Informatics Engineering (IC2IE), 286–292.
 DOI: 10.13140/RG.2.2.22908.16008
- Hung, M. L., Chou, C., Chen, C. H., & Own, Z. Y. (2010). Learner readiness for online learning: Scale development and student perceptions. *Computers and Education*, *55*(3), 1080–1090. DOI: 10.1016/j.compedu.2010.05.004
- Hunt, A.M. (2015). Blended online learning in initial teacher education: A Professional Inquiry on preservice teachers' inquiry projects. *Journal of Open, Flexible, and Distance Learning*, 19(2), 48-60. https://www.learntechlib.org/p/161942/
- Joksimović, S., Gašević, D., Kovanović, V., Riecke, B. E., & Hatala, M. (2015). Social presence in online discussions as a process predictor of academic performance. *Journal of Computer Assisted Learning*, 31(6), 638–654. DOI: 10.1111/jcal.12107
- Linjawi, A. I., & Alfadda, L. S. (2018). Students' perception, attitudes, and readiness toward online learning in dental education in Saudi Arabia: a cohort study. *Advances in Medical Education and Practice*, *9*, 855–863. DOI: 10.2147/amep.s175395
- Mohalik, R., & Sahoo, S. (2020). E-readiness and perception of student teachers' towards online learning in the midst of COVID-19 pandemic. *SSRN Electronic Journal*, 2020(8). DOI: 10.2139/ssrn.3666914
- Munshi, J. (2014). A method for constructing Likert Scales. *SSRN Electronic Journal*, 2014(4). DOI: 10.2139/ssrn.2419366
- Neupane, H. C., Sharma, K., & Joshi, A. (2020). Readiness for the online classes during COVID-19 pandemic among students of Chitwan Medical College. *Journal of Nepal*

- Health Research Council, 18(2), 316–319. DOI: 10.33314/jnhrc.v18i2.2725
- Rasmitadila, Aliyyah, R. R., Rachmadtullah, R., Samsudin, A., Syaodih, E., Nurtanto, M., & Tambunan, A. R. S. (2020). The perceptions of primary school teachers of online learning during the covid-19 pandemic period: A case study in Indonesia. *Journal of Ethnic and Cultural Studies*, 7(2), 90–109. DOI: 10.29333/ejecs/388
- Rasouli, A., Rahbania, Z., Attaran, M., & Gaduate, J. (2016). Students' readiness for e-learning application in higher education. *Malaysian Online Journal of Educational Technology*, *4*(3), 51-64. https://files.eric.ed.gov/fulltext/EJ1106478.pdf
- Smith, B.G. *E-learning technologies: A comparative study of adult learners enrolled on blended and online campuses engaging in a virtual classroom.* Doctor of Philosophy thesis, Capella University. Retrieved April 29, 2021, from https://www.learntechlib.org/p/115478/.
- Smith, C., Hoderi, M., & Mcdermott, W. (2019). A preliminary study of students' perception and learning from different delivery methods. *Academy of Educational Leadership Journal*, 23(2), 1-8. https://www.abacademies.org/articles/A-preliminary-study-of-students-perception-and-learning-from-different-delivery-methods-1528-2643-23-2-130.pdf
- Triandis, H. C., & Hofstede, G. (1993). Cultures and Organizations: Software of the Mind. *Administrative Science Quarterly*, *38*(1), 132-134. DOI: 10.2307/2393257
- Vance, T. C., Merati, N., Yang, C. P., & Yuan, M. (Eds.). (2016). *Cloud computing in ocean and atmospheric sciences*. London: Academic Press.
- Wan Husin, W. N. F., Arsad, N. M., Othman, O., Halim, L., Rasul, M.S., Osman, K., & Iksan, Z. (2016). Fostering students' 21st century skills through Project Oriented Problem Based Learning (POPBL) in integrated STEM education program. *Asia-Pacific Forum on Science Learning and Teaching*, 17(1), 60-77. https://www.eduhk.hk/apfslt/download/v17_issue1_files/fadzilah.pdf
- Weidlich, J., & Bastiaens, T. J. (2018). Technology matters The impact of transactional distance on satisfaction in online distance learning. *International Review of Research in Open and Distance Learning*, 19(3), 222–242. DOI: 10.19173/irrodl.v19i3.3417