A REPORT ON FSSH UTM'S EXPERIENCE TOWARDS DIGITIZING EDUCATION

C20 Temporarily closed Faculty of Science
Temporarily closed School of Education, FSSH, Universiti... Temporarily closed

NINA DIANA NAWI. KEW SI NA. NURHASMIZA ABU HASAN SAZALLI. FATIN ALIAH PHANG. WAN NUR ASYURA WAN ADNAN. WAN FARAH WANI WAN FAKHRUDDIN. ANA HAZIQAH A. RASHID. MOHD SHAFIE ROSLI. NOOR AZEAN ATAN. AKMALIZA ABDULLAH. NUR HAZIRAH SETH@NOH. ZAIDATUN TASIR.



A REPORT ON FSSH UTM'S EXPERIENCE TOWARDS DIGITIZING EDUCATION

Cetakan Pertama/ First Printing 2020 Hak Cipta Universiti Teknologi Malaysia/ Copyright © 2020 Universiti Teknologi Malaysia

All right reserved. No part of this publication may be reproduced, stored in a retrieval system or transmitted in any form or by any means, electronic, mechanical, photocopying, recording or otherwise, without prior permission of Faculty of Social Sciences and Humanities, UTM.

Perpustakaan Negara Malaysia

Cataloguing-in-Publication Data

A REPORT ON FSSH UTM'S EXPERIENCE TOWARDS DIGITIZING EDUCATION

ISBN 978-967-2401-13-1

Authors

Nina Diana Nawi, Kew Si Na, Nurhasmiza Abu Hasan Sazalli, Fatin Aliah Phang, Wan Nur Asyura Wan Adnan, Wan Farah Wani Wan Fakhruddin, Ana Haziqah A. Rashid. Mohd Shafie Rosli, Noor Azean Atan, Akmaliza Abdullah, Nur Hazirah Seth@Noh & Zaidatun Tasir

Cover Design

Dr. Nina Diana Nawi

Published in Malaysia by

FACULTY OF SOCIAL SCIENCES AND HUMANITIES
UNIVERSITI TEKNOLOGI MALAYSIA
81310 UTM JOHOR BAHRU, JOHOR, MALAYSIA

Executive Summary

This research report is presented as the experience of the Faculty of Social Sciences and Humanities, Universiti Teknologi Malaysia (FSSH UTM) went through to change the mindset and implementation from the traditional face-to-face (f2f) teaching and learning to Online Learning (OL) before, during and after the Coronavirus disease 2019 (COVID-19) pandemic. In October 2019, FSSH UTM made plans to widen blended learning for all its academic staff and students as a way forward in teaching and learning. This is in line with the National e-learning Policy (DePaN). If this is successful, academic programs of FSSH UTM can be more accessible and marketable, especially special programs such as Open Distance Learning (ODL), Remote Supervision, and other stackable courses. However, changing the mindset of the academic staff at the beginning was not easy as there is no major push factor to make the academic change. Although the university recommended one week of online learning in the mid-semester of the September 2019 semester (Sem 1 2019/2020), it was not enforced and accepted by the majority of the academic staff.

To accelerate the shift of mindset, FSSH UTM conducted a one-day training of Blended Learning (Replacement Mode) for all of the 265 academic staff in 4 days from February 4, 2020. This was followed by a mandatory implementation of OL of at least three sessions in Sem 2 2019/2020 starting February 2020. The major video conference tool used by the academic staff was Big Blue Button (BBB) in the UTM e-learning platform. Faced with overloaded of the usage of BBB, UTM Digital increased its capacity to 4 servers (4 Terabytes outbound traffic) to run more than 124 sessions of BBB with 3750 users at one time to support OL. UTM Digital subsequently increased the subscription of video conference tools such as Webex and introduced other tools such as Zoom, Google Meet, Microsoft Teams, and others.

March 18, 2020 marked the date of the start of the Movement Control Order (MCO) for Malaysia. All academic staff are forced to work from home, and no f2f is allowed until MCO is lifted. UTM took the bold move to be the first university in Malaysia to start OL from 1st April 2020 without waiting for the MCO to be lifted. This is to ensure that students can continue with their education and graduation as anticipated. With the preparation earlier, FSSH UTM is already prepared to implement OL with a small group of academic staff that need technical assistance. Buddy system was introduced to help this small group of academic staff to run OL at the beginning.

To study the implementation of OL, an online survey was conducted to all the academic staff. From the survey, 98.29% of courses (450 courses) have successfully implemented OL in the first two weeks of April 2020. From that total, 78.36% of the courses were run synchronously while the rest were run asynchronously. The asynchronous mode of OL is important because some students are experiencing very poor internet connectivity at home. The asynchronous mode of OL helps the students to learn at their own pace and time.

Moving forward, FSSH UTM academic staff are asked to re-designed their courses to eliminate f2f as the possibility for the students to return to UTM for classes is near to impossible. They were also asked to change the assessment methods to avoid the use of labs and workshops, f2f assignment, and final examinations. A total of 116 courses switch from final examination to course work, while only 20 courses opt for online final examinations. MCO also affected the Teaching Practicum and Industrial Training, where OL is practiced for the Teaching Practicum while work from home is recommended for Industrial Training.

OL has opened up a more comprehensive opportunity for the accessibility and outreach of education, cost, and time-saving in terms of traveling, minimizing gaps, and make education more inclusive. With the experience gained and skills developed among the academic staff to conduct OL, this also opens up the opportunity to offer more ODL programs, online modular courses, stackable courses, blended programs, and online training. FSSH UTM is ready to embark on the digitalization of education even after the MCO is lifted soon.

Preface

Education is a lifelong journey and has been one of the basic needs of people across the world. In building a sustainable society, the United Nations have earmarked for quality education, as the Goal Number 4 in the 17 Sustainable Development Goals (SDG) is intended to widen access to quality education. With the advent of Industrial Revolution 4.0 and Education 4.0, the need to digitize education has been ever more pressing for Higher Education Institutions (HEI). Over the years, Universiti Teknologi Malaysia (UTM) has pursued an important mission to digitize education by leveraging on 4IR. It aims at uprising education and building a resilient eco-system to deliver a good quality education that is integrated with technology and data driven technique. In HEI, sweeping transformation naturally takes time, and I personally regard the COVID-19 Pandemic as the messiah of a sweeping cultural shift that has brought glad tidings for us, and for HEI across the world. The lockdown and Movement Control Order (MCO) imposed by countries during the COVID-19 Pandemic has caused severe disruptions in the conventional face-to-face delivery of education, resulting in the emergency of remote and online teaching.

Online and digital education is now accepted as a new norm and a bare necessity across the world in ensuring access to quality education. The COVID-19 pandemic has witnessed our challenging journey of digitising the education that has been transformed within these few months when UTM became the first university in Malaysia to fully shift to online learning on April 1st, 2020. UTM has actually taken a large-scale initiative toward digitising the education which began in 2013 with the launch of the UTM-MIT BLOSSOMS (Blended Learning Open Source Science or Math Studies) mega project. In enhancing the implementation of online learning, we glorify the best practices through NALI (New Academia Learning Innovation), which is the UTM signature international event to promote online learning, whereby we continuously motivate, monitor, incentivise and award our inventors, lecturers and practitioners of e-Learning. UTM has also successfully developed and offered 15 Massive Open Online Courses (MOOC), and it is expected to offer an additional 15 courses by 2021. Moreover, in 2019, UTM became the first university in Malaysia to offer an accredited Open and Distance Learning (ODL) for three Master programs, in which the course delivery, assessment, supervision and student registration and orientation are fully delivered and conducted through the online way.

I feel proud to note that Faculty of Social Sciences and Humanities (FSSH), UTM has been the evangelists in pioneering the effort to digitise education. Most of the aforementioned initiatives have been championed and driven by our dedicated FSSH lecturers; for instance, before the MCO FSSH has made extensive preparations to implement Online Learning (OL). In this respect, this report is a testimony of FSSH enduring the commitment and relentless efforts towards digitizing education well before MCO and throughout the period of MCO. This report has documented two key studies involving the cultural shifts of the lecturers, and the experiences of OL implementation at FSSH. FSSH has also generously shared their visions and the ways to strengthen the digital education at the faculty level.

I am pleased to warmly congratulate UTM FSSH for their efforts in immortalising their experiences in this report. This is most exemplary and vital not only for UTM faculties, but also for other universities as a reference in preparing their communities for digitising education.



Prof. Ir. Ts Dr. Zainuddin Abdul Manan Deputy Vice Chancellor (Academic & International) Universiti Teknologi Malaysia

Table of Contents

Executi	ve Summaryiv
Preface	ivi
Online	Learning1
1.1	Definition and History
1.2	Learning vs. Teaching in Online Learning
1.3	Research in Online Learning
1.4	Online Learning: Tools vs. Knowledge 6
1.5	Summary 6
COVID	and Online Learning8
2.1	Movement Control Order (MCO) due to COVID-198
2.2	UTM during MCO8
2.3	Online Learning at FSSH UTM during MCO9
2.4 9	Summary
Online	Learning Training14
3.1	Training Objectives
3.2	Training Initiatives by University14
3.3	Training Initiatives by Faculty
3.4	Training Initiatives by School/Academy
3.5	Training Initiatives by FSSH UTM during MCO
3.6	Summary
Mindse	t Change
4.1	Online Learning Clinic Syllabus
4.2	Data collection
4	.2.1 Survey
4	.2.2 Focus group interview
4.3	Important findings from the surveys and interviews
4.3	Summary
Online	Learning Implementation and Analysis36
5.1	Implementation of Online Learning (OL)

5.1.1	Student Readiness towards Online Learning Implementation
5.1.2	Academic staff Readiness for Online Learning Implementation
5.2	Findings from Online Learning Implementation
5.2.1	Statistic of Online Learning Implementation
5.2.2	Online Teaching Methods Used
5.2.3	Online Tools
Summa	ry45
Issues and	Challenges
6.1 Is	ssues and Challenges on Online Learning Implementation
6.2 C	Online Learning Experience
6.3	Challenges of the Online Learning Implementation
6.4	Recommendation on the Online Learning Implementation
Summa	ry54
Way Forw	ard55
7.1 Emb	prace the Impact of Change55
7.2 Digi	tal Nomads56
7.2.1	Open Distance Learning (ODL)57
7.2.2	Digital Skills in Educational Technology 57
7.2.3	Better Access to ICT Infrastructure for Students and Staff
7.3 Esse	ential elements for the change
7.3.1	Training and support for academic staff
7.3.2	Minimizing the Generation Gap 59
7.3.3	Inclusive Online Learning 59
7.3.4	Cost Minimization for Students
7.4 Onl	ine Learning Repository and Resources of OL
Summa	ry61

Chapter 1

Online Learning

Zaidatun Tasir

1.1 Definition and History

The term "Online Learning" is derived from the expanded "e-learning" term during the 20th century. Historically, the 20th century is known as The Information Age and The Internet Boom, as the 1990s was heavily influenced by the rise of "tech boom" or "Internet Bubble", which then led to the introduction of the internet as one of the important technologies in communication. In the late 20th century, e-learning was defined as online learning or virtual learning. Long before the 20th century, e-learning was simply described as "electronic learning" that involves any electronic devices such as radio, television, and video player. In 1976, the first university in the world, Coastline Community College, Fountain Valley, California offered its degree program solely through telecommuting technologies using television, radio, recordings, and tapes.

Also in the early 90s, Learning Management System was first introduced commercially, especially to higher education institutions. At the Universiti Teknologi Malaysia (UTM), e-learning has been initiated since 1997 through "Campus Cyber Program" launched by the Education Minister. UTM's e-learning system at that time was known as "Sistem Pembelajaran Maya" or "Virtual Learning System" whereby every academic staff had their own virtual learning website. In 2001, UTM coordinated all the independent virtual learning websites via a centralized Learning Management System using WebCT Learning Management System. The use of e-learning at that time was focused only on undergraduate programs. In addition, an e-learning task force was also set up at university level to promote and provide support for academic staff and students. In 2005, UTM switched to an open e-learning system and has since continued using it till present time.

Due to the tremendous development of internet technologies, the horizon of Online Learning (OL) continues to broaden and today, it is reckoned as an essential provider in the accessability of distance learning. OL can be delivered either synchronously or asynchronously. Nevertheless, it is best to have the combination of both forms depending on learning goals. Synchronous online learning allows academic staff to deliver their lectures in real time, and students can ask questions during the lecture as well as interact easily with their peers and academic staff to clarify their understanding. Whereas for asynchronous online learning, students can learn and interact anytime and anywhere without constraint. Through this form of online learning, learning can even be carried out when students are in offline mode. Tools and applications that support asynchronous online learning are Asynchronous Online Discussion Forum (AODF), WhatsApp, e-mail, Telegram, and so on.

1.2 Learning vs. Teaching in Online Learning

In a conventional learning and teaching setting, learning influences changes of behavior and involves the ability of encoding information in short term memory before being stored permanently in long term memory, so that it can be recalled at a later point. This process also relates to knowledge construction occurrence, where learners interact with experts and peers, depending on their brain's storing information capability. However, learning through an online medium has emerged as a form of social network relation (Haythornthwaite, 2008), where learners interact with content, experts, peers, societies, environments, technologies and surroundings in the acquisition of knowledge. In the context of online media such as social media, learning can take place through online communities where the crowd is massive and complex. As for online learning through Learning Management System, learning is more focused, since most of the participants have a shared learning interest.

It should be noted that OL is not solely about the physical aspect of internet technology, but also the manifestation of educational theories; specifically learning theories. The integration of learning theories with technology has changed students' thinking and ways of constructing knowledge. In the setting of OL, learners need to equip themselves with OL soft skills; for example, online critical and creative thinking skills, online problem-solving skills, online collaborative learning skills, and online social presence among others. At a certain stage, technology has brought about new perspectives on how learning through online media requires certain adjustment to the existing scope of learning theories. With that, several new learning theories have emerged. For instance, situated cognition, distributed cognition, socially shared cognition, and connectivism, to name a few. Apparently, this shows that technology indeed has a strong influence on the transformation of existing learning theories and this would eventually lead to the birth of new educational theories. Therefore, the way academic staff, view and understand how the students learn also need to be transformed.

Not only higher education academic staff, even the online learning experts; most of whom are Generation-X and Baby Boomers; also need to transform their views, thinkings and beliefs about online learning for 2020. Academic staff, were born as Gen-X and Baby Boomers while students are categorized as Generation Z, also known as iGen or centennials. Gen-Z refers to the generation that was born between 1996-2010, following the millennials. This generation has been raised on the internet and social media, with some of the oldest finishing college and entering the workforce by 2020. They are our university undergraduate students who have different thinking styles and ways of life. According to a study; 'The Not-So-Secret Lives of the Malaysian Gen-Z'; by Ipsos UU (2019) in partnership with Ogilvy Malaysia, Gen-Z in Malaysia accounts for around 26% of the nation population. The study also revealed that Malaysia's Gen-Z behavior and attitudes are fashioned by six pop culture elements, which are language, sports and fitness, gaming and social media, music, food and beverage, and sustainability. They cannot live without the Internet since they were born in the era of social media and they favor socializing through online media. Therefore, the learning and teaching in higher

education must focus more on learning instead of teaching where more spaces need to be creatively created for students to socialize with their peers, and even with outside experts beyond the classroom setting. In addition, academic staff also need to formulate learning activities more instead of producing teaching notes. The learning activity must be designed in a way that will automatically trigger learning and allow students to control their own learning. With this, academic staff can act as the "real" facilitator. Besides learning activities, learning materials must also be self-explanatory and able to engage students in learning.

Learning and teaching via the online environment is believed to be more effective than the traditional face-to-face method because the former allows students to participate and contribute to a discussion in their own time. In AODF, students can participate at any time and from any place, giving them more time to discuss and think about the issues and problems, and have more freedom to express their thoughts and ideas. This form of discussion will enhance students' reflections and interactions with others. Discussion is considered as a powerful tool for developing soft skills such as problem solving, critical thinking, collaboration and reflection. Rourke and Anderson (2002) asserted that discussion is an excellent activity for supporting the construction of knowledge, because explaining, elaborating and defending one's position to others "forces learners to integrate and elaborate knowledge in ways that facilitate higher-order learning". In Institutions of Higher Education (IHE), the use of AODF is common since most of the learning management systems provide AODF as their learning tools in accordance with the current development in technology.

Additionally, online discussion forums have a unique capacity to support higher-order constructivist learning and the development of a learning community (Levine, 2007). In a survey carried out by Cheong and Cheung (2008), about 84% of students agreed or strongly agreed that they learnt more in an online discussion environment; hence, they concluded that most of the students perceived online discussion as useful in terms of providing them with the opportunity to learn and improve their thinking skills. One factor that provides such an opportunity is the online discussion environment, which plays an important role in the learning process, and collaborative learning is likely to be restricted to instructional approaches. The learning environment, therefore, needs to support the underlying principles (Sockalingam, 2010).

An online discussion platform is an effective place for academic staff to coach and develop deeper and more reflective learning among learners. This method of teaching is called 'scaffolding', which refers to the process by which a teacher or more knowledgeable peer assists a learner so that he or she can solve a problem or accomplish a specific task (Sharma & Hannafin, 2007). According to Vygotsky (1978), learners should be 'scaffolded' by a "more capable peer" or instructor in order to solve a problem or perform a task that is difficult for them to solve on their own. Scaffolding interaction can be divided into interaction with the instructor and peer interaction.

In online learning, the relationship between the academic staff and the students needs to be changed because of the loss of the face-to-face interaction found in the conventional classroom (Andresen, 2009). Baran and Correria (2009) concluded that the students participating in their study perceived peer-facilitated discussions as more meaningful and interactive because they felt that their contributions had created a strong sense of community. Baran and Correria's findings were consistent with those of Poole (2000), who found more postings when the sampled students moderated the discussions.

1.3 Research in Online Learning

Through OL, various research opportunities about OL can be carried out. At the School of Education, Faculty of Social Sciences and Humanities, UTM, a majority of research on learner's interaction and OL behaviors have been explored. Table 1.1 shows some of the research studies that have been carried out since 2013.

Table 1.1: Studies on Learners' Interaction and Online Behaviours

Titles	Researchers	Learning & Teaching Setting	Findings of Research
Peer Scaffolding in Promoting Critical Thinking Engagement	Shukri & Tasir	Facebook	Peer Scaffolding Framework through Facebook
Depicting Students' Social Presence on Social Networking Site in Course-Related Interaction.	Al-Dheleai, Tasir & Jumaat (2020), SAGE Open	Facebook	Students' Social Presence in Facebook
Interacting through Disclosing: Peer Interaction Patterns Based on Self- Disclosure Levels via Facebook	Sidek, Tasir & Jumaat (2018), Journal of Theoretical and Applied Information Technology	Facebook	Peer Interaction Patterns via Facebook
Learning analytics experience among academics in Australia and Malaysia: A comparison.	West, Tasir, Luzeckyj, Kew, Toohey, Abdullah, Searle, Jumaat & Price (2018),	Learning Management System	Profiling of Learning Analytics Experience of Academic Staff

Students' Problem Solving Appraisal and Behaviour in Asynchronous Online Discussion Forum	Australian Journal of Educational Technology (2018) Ariff & Tasir (2017), Innovative Teaching and Learning Journal	Online Discussion Forum	Framework of Students' Problem- Solving Appraisal and Behaviour in AODF
Using Facebook for students' interaction	Al-Dheleai & Tasir (2017), Turkish Online Journal of Educational Technology	Facebook	A Framework of Social-based Learning Interaction through Social Networking Tool
Identifying at-risk students in online learning by analyzing learning behavior	Kew & Tasir (2017), IEEE Xplore	Learning Management System	Learning Analytics Intervention
A framework of metacognitive scaffolding in learning authoring system through Facebook	Jumaat & Tasir (2016), Journal of Educational Computing Research	Facebook	Metacognitive Scaffolding
Enhancing collaborative reasoning skills in online learning.	Rashid, Shukor & Tasir (2015), IEEE Xplore	Online Learning	Peer Scaffolding Model in an Online Collaborative Learning Environment
Exploring students' knowledge construction strategies in computer-supported collaborative learning discussions using sequential analysis	Shukor, Tasir, van Der Meijden & Harun (2014), Educational Technology and Society	Shukor, Tasir, Harun and Van Der Meijden (2014),	Knowledge construction
A predictive model to evaluate students' cognitive engagement in online learning.	Shukor, Tasir, Harun & van Der Meijden (2014), Procedia and Social Behavioral Sciences	Online Learning	A predictive model of students' cognitive engagement

Pattern of reflection in Mohamad, Tasir, Blogging The pattern of learning Authoring Harun & Shukor Reflection through

System through (2013), Computers & Blogging blogging Education

1.4 Online Learning: Tools vs. Knowledge

According to the survey findings by Ipsos in 2019, Gen-Z in Malaysia are exaggerative in showing their expressions through visual communication tools such as emotions, stickers and so on. These visual communication tools help them to express their emotions easily. This might be one of the rationales why most of the students prefer learning notes in the form of graphics rather than texts alone. They use technological tools frequently and for them, technology is knowledge and not just skills and tools for learning. However, when it comes to online learning, most of the students have started to embrace it as a new experience and "new normal" of learning during and post COVID-19.

For the academic staff, what is your take on technology and online learning? Is online learning suitable to be marked as nothing but a tool only? Should it be reckoned as a valuable type of knowledge that needs to be a part of academic staff DNA? To me, online learning is a part of knowledge that needs to be attained and mastered by all academic staff. Therefore, higher education institutions must provide support to train academic staff to acquire this type of knowledge. Besides that, resources for OL materials need to be carefully designed to encourage self-paced learning among students. Faculty of Social Sciences & Humanities, Universiti Teknologi Malaysia (FSSH UTM) has started an initiative to set up an Online Learning Material Repository for students and academic staff. The repository will focus on students and academic staff as content curators to inculcate learning and teaching accountability among themselves.

1.5 Summary

Following the National e-Learning Policy (DePAN) to widen the use of OL in higher learning institutes, FSSH UTM has started the initiatives to accustom its academic staff towards the use of OL in their teaching and learning. This was started by setting up the Blended Learning Task Force in January 5, 2020 to provide training of OL to all academic staff and monitor the implementation of OL. The training and the implementation of OL were accomplished before the Movement Control Order (MCO) which will be further discussed in Chapter 3. This just proved that FSSH UTM has already moved towards OL before the push factor of MCO; hence, the academic staff of FSSH UTM is more than ready to implement OL when MCO started.

References

- Andresen, M. A. (2009). Asynchronous discussion forums: Success factors, outcomes, assessments, and limitations. Journal of Educational Technology & Society, 12(1)
- Baran, E., & Correia, A. P. (2009). Student-led facilitation strategies in online discussions. Distance Education, 30(3), 339-361
- Cheong, C. M., & Cheung, W. S. (2008). Online discussion and critical thinking skills: A case study in a Singapore secondary school. Australasian Journal of Educational Technology, 24(5), 556-573
- Grabowski, B. (2009). ICT as an Enabler for Effective Learning Design: Its Evolving Promise. International Journal for Educational Media and Technology 2009, Vol.3, Num. 1, pp. 12-23
- Haythornthwaite, C. (2008). Learning relations and networks in web-based communities. International Journal of Web-Based Communities 4(2):140-158
- Ipsos (2019). Gen-Zs: The 'Status-fying' Cohort!. https://www.ipsos.com/en-my/gen-zs-status-fying-cohort.
- Levine, S. J. (2007). The online discussion board. New directions for adult and continuing education, 2007(113), 67-74
- Poole, D. M. (2000). Student participation in a discussion-oriented online course: A case study. Journal of research on computing in education, 33(2), 162-177
- Rourke, L., & Anderson, T. (2002). Using peer teams to lead online discussions. Journal of interactive media in education, (1)
- Sharma, P., & Hannafin, M. J. (2007). Scaffolding in technology-enhanced learning environments. Interactive learning environments, 15(1), 27-46
- Sockalingam, N. (2010). Characteristics of Problems in Problem-Based Learning. Dissertation, Erasmus University, Rotterdam
- Vygotsky, L. S. (1978). Mind in society. Cambridge, MA: Harvard University Press

Chapter 2

COVID and Online Learning

Fatin Aliah Phang

2.1 Movement Control Order (MCO) due to COVID-19

The world was shocked by the report of Severe Acute Respiratory Syndrome Coronavirus-2 (SARS-CoV-2), which causes the Coronavirus Diseases 2019 (COVID-19) in December 2019 from Wuhan City, China (WHO, 2020). Subsequently, Malaysia reported the first case of COVID-19 patient on January 25, 2020 from a Chinese tourist. On February 4, 2020, Malaysia reported the first Malaysian COVID-19 patient. Since then, more cases were reported, and the number spiked following the Tabligh Congregation in Sri Petaling after March 2020. As the total number of cases soared to 553 patients, the Prime Minister of Malaysia, Tan Sri Muhyiddin Yassin announced the first Movement Control Order (MCO) from March 18-31, 2020 to break the chain of the spread of the disease by keeping everyone at home except for the essential service sectors. Under the first MCO, all education institutions from childcare to universities were ordered to close. This has forced academic staff at Universiti Teknologi Malaysia (UTM) to work from home as civil servants must abide by the instruction from the Director-General of Public Service.

2.2 UTM during MCO

The Vice Chancellor of UTM issued an announcement to cancel all teaching and learning activities during the period of the first MCO. No classes, lectures, tutorials, practical works, supervisions, examinations, viva voce, and student activities can be conducted during the period, including face-to-face (f2f) or online learning. However, during the period of the first MCO, UTM has decided and planned to resume teaching and learning activities through online facilities starting April 1, 2020 without waiting for the certainty if MCO will be lifted on April 1, 2020. Therefore, during the first week of MCO, intensive discussions were made to ensure that UTM can resume online learning (OL) from April 1-14, 2020, whether the MCO is lifted or not. This was announced as early as the beginning of the first MCO with an announcement without waiting for the announcement from the Ministry of Higher Education.

To facilitate the OL starting April 1, 2020, the academic calendar of the university was updated. The original semester break for UTM degree students should be from March 29, 2020 to April 2, 2020, while the revision week starts on May 24, 2020. A Senate meeting was conducted on March 25, 2020 to approve the new calendar that changed the semester break from March 18 -31, 2020 (the first MCO period) while the revision week was pushed to a week later. By doing so, UTM only needs to extend

one week of the semester by considering MCO as the semester break (the first MCO was instructed for two weeks while the original semester break was one week).

However, with the second announcement of the second MCO by the Prime Minister on the evening of March 25, 2020 to extend the MCO until April 14, 2020, the academic calendar was updated again (UTM, 2020) to incorporate the idea of conducting a longer period of OL and expecting a longer period of MCO. The decision was made with the understanding and expectation that the students may not have f2f learning at all for the remaining semester. Therefore, the final updated academic calendar has taken into consideration giving five extra weeks for the students to adjust and catch up their learning through online medium. Now, the academic staff and students have the option to extend their learning time if needed. UTM also made the following announcement following the second MCO and the latest academic calendar:

- 1. Teaching and learning activities are to be carried out through distance and online learning (OL) from April 1, 2020 to July 24, 2020, that is, until the end of Semester II, Session 2019/2020 (Reference: Academic Calendar Session 2019/2020 Edition 3). The basis of UTM's decision to implement online and distance learning beginning from April 1, 2020.
- 2. The use of distance learning distance/online learning methods is given priority to lectures, assignments, projects, presentations. In contrast, alternative distance/online methods are preferred for practical learning and teaching (LnT) activities, service learning, and assessment, which includes final examinations and so forth.
- 3. The faculty and academic staff should provide an inclusive and appropriate distance learning methods, which also take into consideration students who have no internet access to participate in online learning fully.
- 4. Students are requested to remain at home or at their respective accommodations to follow distance and online LnT activities for the entire semester.
- 5. LnT activities which cannot be completed during Semester II, especially those that require students' physical presence such as workshops, laboratories, studios, service learning, final examinations, etc., should be carried out toward the end of Semester II and/or Semester III, as required, provided that the Faculty obtains approval from the Faculty's Academic Committee based on the guidelines issued by UTM Senate. The implementation of face-to-face LnT activities is also subject to the government's decision on the Movement Control Order.

2.3 Online Learning at FSSH UTM during MCO

UTM took the bold move to be the first university in Malaysia to start OL from April 1, 2020 without waiting for the MCO to be lifted. This is to ensure that students can continue with their education and graduation as anticipated. With the preparation earlier, FSSH UTM is already prepared to implement OL. FSSH UTM announced how OL would be conducted on April 6, 2020.

On April 1, 2020, FSSH UTM conducted a survey among academic staff on their implementation of OL. All the academic staff is required to report the conduct of their OL for every course. The result of the survey will be presented in Chapters 5 and 6. Various mediums were used by the academic staff to conduct OL such as Webex, Zoom, Google Meet, Microsoft Teams, Skype, Whatsapp, Telegram, UTM e-learning, emails, and so on.

As the university has conducted several online training to prepare academic staff for OL since March 24, 2020, some senior academic staff who may not be tech-savvy required more personal instruction to learn the use of the online and video conferencing tools. FSSH UTM, through its Blended Learning Task Force, assigned younger academic staff to buddy with them to guide them to use the tools. The buddy system known as "Sistem Adik-Abang-Kakak Angkat" is proven to be a success as the senior academic staff becomes less anxious and scared to use the tools. After one week of guidance and practice, they can independently use the tools to run their own OL classes. Furthermore, FSSH UTM also provides OL Clinic for their academic staff to seek personal help on OL. The poster in Figure 2.1 shows the promotion of FSSH OL Clinic and the list of academic staff that could assist OL.



Figure 2.1: FSSH OL Clinic poster

FSSH UTM also organized and conducted its own OL training to provide more opportunities for the academic staff to become more skillful and confident in preparing their OL. Figure 2.2 shows an example of a poster of the training provided. The training for assessment is particularly important because FSSH UTM is preparing the academic staff to conduct alternative assessments and online assessments to ensure that assessment of the courses can be conducted without the need for f2f. The

Dean of FSSH UTM also conducted a briefing to all the program coordinators on how to redesign their courses to cater for OL mode on March 25, 2020.



Figure 2.2: FSSH training workshop for OL

As a result of redesigning the courses and assessment methods, a total of 116 courses switched from final examinations to course works only while 20 courses opted for online final examinations. The summary is shown in Table 2.1. The usual process of preparing and vetting final examinations is carried out in May 2020. This is followed by a training workshop to develop the online examinations.

Table 2.1: The status of Final Examinations of courses during MCO

	No Final Exams	Online Final Exams	Traditional Take Home Final Exams	Alternative Take Home Final Exams	Substitute Final Exams with Assignments / Projects
Postgraduate	38	4	18	5	27
courses Undergraduate	53	16	22	4	89
courses Total	91	20	40	9	116

MCO has also affected the Teaching Practice and Industrial Training, where OL is practiced for the Teaching Practice while work from home is recommended for Industrial Training. The Deputy Dean (Academic & Student Affairs) also issued a guideline for the academic affairs for FSSH UTM.

For example, Teaching Practicum, which began on February 7, 2020, has covered five weeks of f2f teaching before the first MCO. Due to the longer period of school closure, Teaching Practice was resumed from April 7, 2020 with online teaching and supervision only. The new guideline and evaluation rubrics for Teaching Practice were disseminated to all the trainees and supervisors. From the survey among the trainees, 49.2% of the trainees conducted task-based teaching, 37.8% conducted asynchronous teaching while 15.2% conducted synchronous teaching. 83.1% of the trainees used WhatsApp as the medium for teaching and learning for their students. The attendance of the students during the synchronous sessions was 60.1%. This shows that Teaching Practice is appropriate to be conducted via OL. This provides FSSH UTM students with extra skills in teaching besides f2f teaching skills. The teaching practice will end on May 23, 2020. It has fulfilled the minimum of 70% of Student Learning Time (SLT) as allowed by MQA (MQA, 2020).

UTM approved the online proposal and viva-voce examinations on March 25, 2020, (Figure 2.3) which commences starting April 19, 2020. The School of Graduate Studies published an agreement that must be signed by the candidate before the oral examinations. This is to ensure that there is no misconduct during the examinations and the candidates understand the guideline, risks as well as liabilities, and accept the procedures of conducting the oral examinations online.



Figure 2.3: Online viva voce for UTM

The guideline, as in Figure 2.3, also provides extra information on the conduct of the oral examinations at FSSH UTM. FSSH UTM has conducted its online oral examinations. An Assistant Chair

is appointed for each session to help the Chair to record the corrections that need to be amended by the candidate. A Google Drive is set up to share the candidate's thesis, examiners' reports, and chair's report. The chair's report is expected to be completed during the session using Google Docs that are shared between the Chair and the Assistant Chair so that the Chair can also edit the report and check what is missing during the session immediately. A 'lobby' is created using WEBEX to hold the candidate before the beginning of the session and during the discussion of the result.

On April 20, 2020, FSSH UTM conducted its first online proposal examination while on April 29, 2020, FSSH UTM conducted its first online viva session. Until the end of May 2020, FSSH UTM has conducted 17 online proposal examinations and 12 online viva sessions for its Master and PhD students. Generally, all the sessions were conducted smoothly and successfully. The students expressed their satisfaction of the sessions and are more relax as they are not in the examination room as the normal practice.

2.4 Summary

COVID-19 has become the push factor to drive OL to be fully implemented at FSSH UTM earlier than it has expected. As groundwork has been implemented before the MCO to shift the academic staff towards OL, implementing a full mode of OL at FSSH UTM due to MCO is proven to be easier and faster. Only a handful of senior academic staff that need personal guidance towards OL, a vast majority of the academic staff is well equipped to conduct OL on their own due to the preparation and training given by FSSH UTM in 2019 and early 2020. The next chapter will present the training conducted before and during the MCO for OL.

References

MQA (2020). Guidelines on the Delivery of Higher Education Programmes during and Post COVID-19 Movement Control Order (MCO). 29 March 2020 https://www.mqa.gov.my/pv4/document/advisoryNotes/Advisory%20Note%20No.%201%20 2020%20-%20PPPPPT%20EngVer10.4.2020.pdf

UTM (2020). Frequently Asked Questions. 30 April 2002 https://www.utm.my/covid19/faq9/WHO (2020). Coronavirus Disease 2019 (COVID-19) Situation Report-94. 23 April 2020 https://www.who.int/docs/default-source/coronaviruse/situation-reports/20200423-sitrep-94-covid-19.pdf?sfvrsn=b8304bf0

Chapter 3

Online Learning Training

Noor Azean Atan, Ana Hazigah A Rashid and Akmaliza Abdullah

3.1 Training Objectives

Training can be defined as the process of improving particular skills up to the required standards meanwhile facilitating is the process of assisting someone to gain knowledge or skills. At FSSH UTM, the training and facilitation for academic staff are aimed at helping and assisting them to conduct online classes. The training will help academic staff in using the software application. It also covers technical aspects that can ensure the effectivity of an online class.

FSSH has started setting up the task force on online training for their academic staff since January 5, 2020. The initiative was started by the Dean of FSSH with the aim to nurture the implementation of blended learning in the process of teaching and learning in the faculty as well as helping university to achieve the objectives of *Dasar e-Pembelajaran Negara* (DePAN). In DePAN, Malaysian government aims to have all public universities in Malaysia to implement blended learning where the teaching and learning process is conducted in both face-to-face and online platforms. The practice of blended learning in DePAN encourages each course in Malaysian public universities to have at least 30% teaching and learning process conducted in an online platform.

Hence, with the new semester of 2019/2020 (2) on February 2020, FSSH UTM has enforced that blended learning must be implemented at least thrice per semester. For that, blended learning training had been scheduled for the academic staff before the semester started. FSSH has taken one step ahead in ensuring that blended learning can be implemented in the Faculty even before the MCO due to the emergence of pandemic COVID-19. Nevertheless, this pandemic has successfully forced all the academic staff to make immediate transformation in their Teaching and Learning (LnT) practices where all classes need to be conducted through online platforms. Hence, FSSH UTM re-strategized the training plan to empower more academic staff to cater for all kinds of LnT processes using online platform, including online learning delivery, online assessment and online interaction learning.

3.2 Training Initiatives by University

During the MCO period, most of the universities in Malaysia conducted online training for academic staff to assist them in using online platforms for LnT processes. Some of the universities also opened training sessions for academic staff from other universities to join in order to share knowledge with each other through several platforms such as Cisco Webex, Zoom, FB Live, YouTube and many

more. In line with that, UTM also initiated online training for their academic staff, led by UTMLead. The training conducted by UTMLead were divided into three phases. They were conducted daily and delivered by UTMs' academic staff.

The first phase focused on online learning delivery, online assessment and student-centered learning in online platforms. This phase gave an overview about online classes for the academic staff. It received an overwhelming response from all the staff who are eager to learn about the arts of executing online classes through online platforms. Due to numerous requests, UTMLead organized the second phase of training which dived deeper into certain tools that can be used for online activities and assessments to create a good online learning environment for the students. In this phase, an online clinic template was provided by UTMLead to guide academic staff in converting the normal Course Information to design an effective online learning environment. At the same time, UTMLead increased the capacity of the training due to overwhelming requests and it was also open to academic staff from other universities. The third phase of the training focused more on the sharing of best practices by UTM academic staff. Academic staff who had volunteered to share their experience in conducting online classes through various platforms were invited. They shared about the tools that they have been using in their classes, how they implement, and how they design the classes based on the situation of their students. On top of that, all the trainings organized by UTMLead were recorded and all the training materials used were shared in a special website that had been created to guide UTM academic staff in conducting online classes during MCO. The website can be reached at https://olc.utm.my/ by not only UTM academic staff, but also people from all over the world!

3.3 Training Initiatives by Faculty

In tandem with the *Dasar e-Pembelajaran Negara* (DePAN 2.0), a policy developed specifically to support the *Pelan Strategik Pengajian Tinggi Negara* (PSPTN) for the provision of quality e-Learning, FSSH UTM has taken the initiative to develop and implement a series of online learning training for academic staff. The purpose of this training is to provide exposure and authentic experience as well as to create a paradigm shift among academic staff through the use of ICT platforms and the integration of multimedia elements in the design of LnT activities. It is expected that the LnT preparation via UTM e-Learning or other digital platforms will provide students with a learning experience that is well in line with the Education 4.0 requirements, where the latest technological advancements are applied to produce world-class human capital, achieved through the acquisition of knowledge and generic skills, using alternative delivery methods other than the conventional face-to-face approaches.

Based on the experience and expertise of the academic staff in the faculty and UTM, who are involved as the expert panel in the development of *Dasar e-Pembelajaran Negara* (DePAN 2.0), the FSSH UTM Blended Learning Task Force has taken various initiatives to encourage academic staff to implement and deliver LnT flexibly and openly, using e-Learning methods. The faculty appreciates

initiatives taken by the e-Learning prime movers, while providing opportunities for academic staff to continue exploring the diversity of online technologies for LnT activities, as outlined in the *Dasar e-Pembelajaran Negara* (DePAN 2.0) which is shown in Figure 3.1 below.



Figure 3.1: Excerpt from the National e-Learning Policy (DePAN 2.0)

In Phase 3 (2021-2025), at least 70% of all courses offered by each HEI should be conducted in the form of blended learning. As such, the faculty has made preliminary plans before the opening of the new semester by conducting three series of Flipped Blended Learning courses as detailed in Table 3.1.

Table 3.1: Flipped Blended Learning Course Session for Online Learning Preparation

Date	Speakers	Flipped Blended Learning Courses	No. of participants	Poster
4/2/2020	 Dr. Noor Azean Atan Dr. Kew Si Na Dr. Akmaliza Abdullah 	FSSH UTM KL: ❖ Language Academy ❖ Islamic Civilization Academy ❖ CASIS	35	Added Blank Andrew Andr

5/2/2020	4.	Dr. Mohd	FSSH UTM JB:		55	OUTM
		Nihra Haruzuan	School Education	of		Rursus Pembelajaran Teradun Gantian
	5.	Dr. Ana	♣ Language			FAKULTI SAINS SOSIAL DAN KEMANUSIAAN Dirasmikan oleh Deban FSSH
		Haziqah A. Rashid	Academy			5 FEB 2020 R.30 per - 1.230 (regular) Malorael Komputer 1 & 2
	6.	Dr. Nurhasmiza				CI4-420-01 & 02 Sekolah Pendidikan, FSSH MEDIGER = MENGERAN
6/2/2020		Abu Hasan	FSSH UTM JB:		52	GUTM STREET
		Sazalli	SchoolHuman	of		Pembelajaran Teradun Gantian FAKUUTI SAINS SOSIAL DAN KEMANUSIAAAI
			Resource	a+ 0.		Directifilate of the Deltar PSSH 6 FEB 2020 KHAMIS
			Developme Psychology	πα		8.30 Peel - 12.30 feesgahari Makmal Komputer (GF-04-03)
			❖ Islamic			Akademi Tamadun Islam (TO7), FSSH
			Civilization			Jurnantities utrix my MENGERISAN
			Academy			

Figure 3.2 shows the FSSH Flipped Blended Learning Course held on February 4-6, 2020. A total of six academic staff were involved as speakers / facilitators for the above courses to share their knowledge about Flipped Blended Learning. This course provided information about blended learning in general, demos / hands-on training in preparing learning activities and examples of assessment which can be designed via UTM e-Learning. Besides, there was also an experience sharing session on the use of other digital online platforms which can be used for online LnT. The following Figure 3.3, 3.4 and 3.5 shows some content of the Flipped Blended Learning course which incorporate the synchronous and asynchronous methods of teaching and learning activities in online learning.



Figure 3.2: The academic staff attending the Flipped Blended Learning Courses

STEPS TO CONDUCT ONLINE CLASS



Figure 3.3: Steps to Conduct Online Class

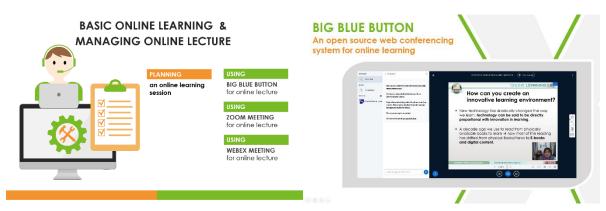


Figure 3.4: Examples of Online Learning Platform



Figure 3.5: Examples of Steps required in Online Learning Activities

Since the completion of this course, oline learning has been implemented by many academic staff teaching various courses, based on their creativity before the mid-semester break. The development of their ideas and excitement after attending the course, have resulted in various online LnT activities being generated using a number of other applications / platforms. Given in Figure 3.5, 3.6 and 3.7 are some examples of online learning platforms applied by the academic staff for courses they were teaching in February and March 2020 prior to the mandatory switch to online learning in compliance with the MCO imposed due to the COVID-19 outbreak.

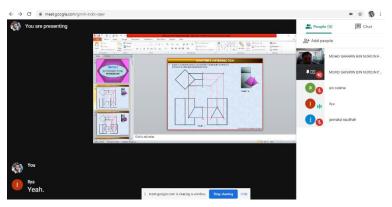


Figure 3.5: The use of Google Meet application for SEAA1422 course: Engineering Drawing by Dr Mohd Safarin Nordin

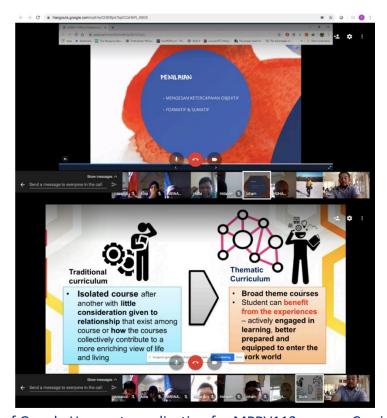


Figure 3.6: The use of Google Hangouts application for MPPV113 course: Curriculum Design in TVE by Assoc. Prof. Dr. Yusri Kamin & Prof. Dr. Muhammad Sukri Saud



Figure 3.7: The use of BigBlueButton application for SHPP1022 course- Teaching Professionalism by Dr. Mohd Rustam Romeli

It can be concluded from this online learning preparation course that the design stage is the most essential part to ensure course effectiveness and learners' motivation and participation. Besides, the appropriate mix of learning activities and technical solutions is crucial in creating an effective and engaging course. A number of things to be considered in designing and developing an online LnT are listed in Figure 3.8.

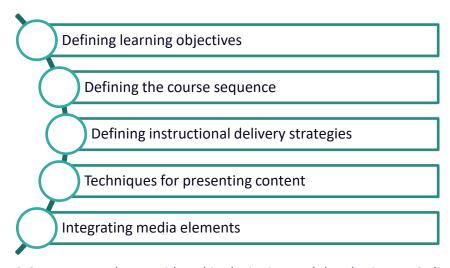


Figure 3.8: Aspects to be considered in designing and developing an Online LnT

In relation to this course, all the members of the faculty's Blended Learning Committee have provided their assistance to those having difficulties in preparing online learning contents, through WhatsApp messages, telephone calls, technical assistance in their offices and video calls to ensure the success of their online classes. Following the needs of further assistance and guidance for some of the FSSH academic staff, both individually and collectively, the task force teams at School / Academy level were formed on March 15, 2020 by the Faculty, before MCO was imposed by the Malaysian government due to the COVID-19 outbreak.

The next section will describe the initiatives and further guidance a school/academy level undertaken by the task force teams in empowering and implementing online LnT 100% by the academic staff, for students taking courses in the 2nd semester-2019 / 2020.

3.4 Training Initiatives by School/Academy

In addition to the training sessions organized by the faculty, schools and academies took their own initiatives to continue supporting the academic staff, particularly those who still view online learning as a daunting task. Soon after attending the Flipped Blended Learning courses organized by the faculty, a few participants requested the faculty's Blended Learning Task Force to further organize similar courses at school/academy level. In response to the request, a series of training courses and clinics on online learning had been conducted before and during MCO as shown in Table 3.2.

Table 3.2: Training initiatives by School and Academy

School/Academy	Details
School of Human	Online Learning Clinic
Resource and	Date: 12 th March 2020 (Thursday)
Psychology (SHARPS)	Time: 10.30am - 1.00pm
,	Venue: Zamrud Meeting Room, T08
	Speaker: Dr. Ana Haziqah
	How to use video conferencing in your teaching (BBB, Zoom, Webex)
	Date: 2 nd April 2020 (Thursday)
	Time: 9.30am - 11.30am
	Venue: Online Meeting
	Speakers: Dr. Ana Haziqah and Dr. Wan Mohd Azam
Academy of Islamic	E-Learning Clinic
Civilization	Date: 20 th February 2020 (Thursday)
	Time: 11.00 am – 12.00 noon
	Venue: ATI Meeting Room
	Topic: Back up & Restore
	Speaker: Dr. Mohd Fauzi Abu @ Hussin
	Facilitators: Dr. Akmaliza Abdullah, Dr. Norhidayu Muhamad Zain and
	Dr. Nur Najwa Hanani Abd Rahman
	Online Teaching & Learning Clinic 1
	Date: 11 th March 2020 (Wednesday)
	Time: 10.00 am – 12.00 noon
	Venue: ATI Computer Lab
	Facilitators: Dr. Mohammad Naqib Hamdan, Dr. Norhidayu Muhamad
	Zain and Dr. Kew Si Na
	Online Teaching & Learning Clinic 2
	Date: 11 th March 2020 (Wednesday)
	Time: 2.30 pm – 5.00 pm

Venue: ATI Computer Lab

Facilitator: Dr. Akmaliza Abdullah

Online Teaching & Learning Clinic 3

Date: 17th March 2020 (Tuesday)

Time: 11.00 am-1.00 pm Venue: ATI Meeting Room

Facilitator: Dr. Mohammad Naqib Hamdan

Online Test Using e-Learning Quiz

Date: 5th April 2020 (Sunday)

Time:10.30 am

Speaker: Assoc. Prof. Dr. Mohd. Fauzi Abu @ Hussin

Pre Recorded Slides Using Screen Cast-O-Matic

Date: 12th April 2020 (Sunday)

Time: 2.00 pm

Speaker: Dr. Norhidayu Muhamad Zain

Language Academy

Flipped Blended Learning 1

Date: 10th March 2020 Time: 2.30-4.30pm Venue: D05- Lab C Speaker: Dr. Kew Si Na

Flipped Blended Learning 2

Date: 12th March 2020 Time: 10.30am-12.30pm Venue: D05- Lab B Speaker: Dr. Kew Si Na

Online Learning and Teaching Clinic 1

Date: 15th March 2020 Time: 2.00pm-4.00pm Venue: D05- Lab B Speaker: Dr. Kew Si Na

Online Learning and Teaching Clinic 2

Date: 16th March 2020 Time: 2.00pm-4.00pm Venue: D05- Lab B

Speakers: Dr. Kew Si Na and Mr. Faizal Yamimi

Online Learning and Teaching Clinic 3

Date: 17th March 2020 Time: 2.00pm-4.00pm Venue: D05- Lab B

Speaker: Ms. Nur Hazwani Mohd Muhridza and Mr. Zaid Shamsuddin

3.5 Training Initiatives by FSSH UTM during MCO

When Movement Control Order, MCO was announced by the Prime Minister on March 16, 2020, FSSH took a prompt action to get the academic staff ready for a seamless transition into a complete online learning environment. Apparently, COVID-19 crisis does not only change the global outlook, but also abruptly shift the way teaching and learning implementation is done at least till the end of this academic year. The academic staff have to swiftly adapt and change from both traditional face to face and blended learning to full online learning mode. As the MCO entered its second phase, UTM on the other hand, decided to commence the 2nd half of the Semester on April 1, 2020. Hence, to FSSH UTM, the urgency to make a fundamental change is real and there is no more room for excuses and resistance against using online platforms during teaching and learning process.



Figure 3.11: Briefing on the Implementation of Online Teaching and Learning during Movement Control Order (MCO) by FSSH Dean

On April 1, 2020, Prof. Dr. Zaidatun Tasir, FSSH Dean gave a briefing to all academic staff on the implementation of online teaching and learning during MCO. Everyone is required to rise to the challenge with knowledge, skills, determination and perseverance through these difficult times. While the university is closed, teaching and learning in UTM continues but in a different setting. Classes no longer occur on the campus. Students are being taught remotely using technology. Due to the unprecedented situation, technology has now become an essential tool and no longer additional to teaching and learning. Academic staff have to be equipped with skills in using online learning platforms, applications and tools. The mindset needs to be changed to ensure the success of online teaching and

learning. In spite of the fact that cyber physical infrastructure is paramount to the education using technology, not all students who are mostly at home are equipped with good online learning infrastructure. Hence, it is deemed important to provide the academic staff with training on multifarious online methods to ensure the flexibility of the process and at the same instant, ensure all of them have the same access to teaching and learning during the crisis. To ensure that learning will not be disrupted and will be run smoothly despite the sudden change, FSSH UTM has taken initiatives by offering a series of trainings on online learning and online assessment in addition to the ones provided by the UTMLead.

a) FSSH Online Learning Clinic

While some academic staff are already competent in online teaching and learning, some might need extra support. Hence, FSSH UTM formed a Buddy Support System (*Sistem Adik-Abang- Kakak Angkat*) as in Figure 3.12 to assist and facilitate them. 24 instructors from SoE, SHARPS, LA & ATI have been appointed to provide a small group and one-to-one coaching sessions for them from April 1-19, 2020. The appointed list is shown in the Table 3.3.

Table 3.3: List of the appointed instructors for Online Clinic

School/ Academy		Appointed instructors
School of Education	i	Dr. Nur Hazirah Noh @ Seth
Seriodi di Education	ii	Dr. Nurul Aini Mohd Ahyan
	iii	Dr. Najua Syuhada Ahmad Alhassora
	iv	Dr. Mohamad Izzuan Mohd Ishar
	V	Dr. Shaharuddin Md Salleh
	vi	Dr. Nina Diana Nawi
School of Human Resource and	i	Dr. Ana Haziqah A. Rashid
Psychology (SHARPS)	ii	Dr. Wan Mohd Azam Wan Mohd Yunus
	iii	Dr. Azra Ayue Abdul Rahman
Academy of Islamic Civilisation	i	Assoc. Prof. Dr. Mohd. Fauzi Abu @ Hussin
	ii	Dr. Akmaliza Abdullah
	iii	Dr. Norhidayu Muhamad Zin
	iv	Dr. Nur Najwa Hanani Abd Rahman
	٧	Dr. Mohammad Naqib Hamdan
Language Academy	i	Dr. Kew Si Na
zangaage / laademy	ii	Cik Nur Hazwani Mohd Muhridza
	iii	Cik Rika Diana Busri
	iv	En. Faizal Yamimi Mustaffa
	٧	En. Ghazali Bunari
	vi	Cik Siti Khadijah Abdul Wahab
	vii	En. Zaid Shamsuddin
	viii	Pn. Shalini Srika a/p Bala
FSSH UTM KL	i	Dr. Nurhasmiza Abu Hasan Sazalli
	ii	Dr. Wan Nur Asyura Wan Adnan



Figure 3.12: Buddy Support System (Sistem Adik-Abang–Kakak Angkat)

The strategy is proven to be successful when 100% of UTM FSSH academic staff who taught the undergraduate and postgraduate students implemented OL and learning using synchronous and asynchronous methods. Multifarious platforms, applications and tools including Big Blue Button, Webex, Zoom, Google Meet, Google Classroom, FB Live, UTM e-Learning, WhatsApp, Telegram, email, YouTube, Padlet, Mentimeter, Video for Teaching & Learning and Voice Thread have been employed. Despite a few challenges they encountered, academic staff gave positive feedback pertaining to their online teaching and learning experience. Many affirmed that their online class ran smoothly and interactively. Students were eager to explore online learning and able to understand the lessons. This will be discussed further in the next chapter.

b) Workshop Series on Online Assessment

One of the challenges in education during a pandemic crisis is how to conduct assessment with the prolonged closure of university. Online assessment has been turned into a compulsory option. Thus, FSSH organized two workshops, namely, Online Test and Take Home Examination that were held three days consecutively from April 7-9, 2020. The objective of the workshops was to equip academic staff with knowledge and skills on how to implement online summative assessment. They were guided to develop traditional graded and ungraded online assessment using the UTM e-Learning as well as create online test using the Assignment, Forum and Quiz tools available in the same platform. Moreover, they were guided to prepare online alternative assessment including problem-based learning question, case-based question, scenario based learning question and authentic learning question that can take place not only on UTM e-Learning but also on Google Form, WhatsApp, Facebook and Email. For those who opt to continue with final examination, the workshop on Take Home Examination provided them with

a guideline on Test Blue Print and HOT item development and they were also guided on the way to conduct online take home examination using UTM e-Learning.

Table 3.4: Workshop Series on Online Assessment

Designing Online Test in UTM e-Learning Platform

Date: 7th April 2020 (Tuesday) Time: 9.30 am-11.00 am

Speakers: Assoc. Prof. Fatimah Puteh & Dr. Kew Si Na

Facilitators: Dr. Noor Dayana Abd Halim & Assoc. Prof. Dr. Noraffandy Yahya

Tools and Approaches in Designing Alternative Online Test

Date: 8th April 2020 (Wednesday) Time: 9.30 am-11.00 am Speaker: Dr. Norasykin Md Zaid

Facilitators: Assoc. Prof. Dr. Norafffandy Yahya & Dr. Noor Dayana Abd Halim

Workshop on Take Home Examination

Date: 9th April 2020 (Thursday) Time: 9.30 am-11.00 am

Test Blueprint & Higher Order Thinking Item Development

Speaker: Dr. Adibah Abdul Latif Facilitator: Dr. Rohaya Talib

Using e-Learning for Take Home Examination

Speakers: Dr. Halijah Ibrahim

c) FSSH KL Online Learning Training

Speakers: Dr. Nurhasmiza Abu Hasan Sazalli & Dr. Wan Nur Asyura Wan Adnan

Table 3.5: Online learning training for FSSH KL during MCO



Level 1

31st March-5th April 2020

- QR Code Attendance
- How to Sign Up Zoom & Create Meeting
- House Keeping when Using Online Platform & Important Buttons eg.
- Finding suitable location with good lighting
- Mute button, Video on Button, Chat, Share Screen

Level 2 Date:

6th April-12th April 2020

Part 1

- How to record & create video using Screencast -O-Matic
- How to record & Create Video using power point
- UTM e-Learning Tools: Forum, Assignment, Online Quiz

Part 2

- How to conduct group discussion Breakout Rooms using Big Blue Button
- New meeting in Zoom Low Bandwith Online Lesson Using Whatsapp

Level 3

13th April- 19th April 2020

- Interactive Online Game: Kahoot & Quizziz
- Interesting Video Presentation: Powtoon
- Interactive Online Content: H5P & EdPuzzle

3.6 Summary

FSSH UTM has started to provide training and implement OL before MCO under the FSSH UTM Blended Learning Task Force. It was never planned as an initiative to confront MCO but to achieve the National E-Learning Policy (DePAN) 2.0. However, all the troubles going against the tide to bring OL into FSSH UTM since the end of 2019 has become a blessing in disguise. FSSH UTM is well prepared to implement OL with 0% drop out when OL has been made mandatory during MCO since April 1, 2020. The next chapter will discuss how mindset could be changed for the academic staff to accept OL in their LnT.

Chapter 4

Mindset Change

Nurhasmiza Sazalli, Wan Nur Asyura Wan Adnan & Wan Farah Wani Wan Fakhruddin

In relation to the Movement Control Order (MCO) by the Malaysian government due to the COVID-19 pandemic, universities in Malaysia have decided that all classes are to be conducted online. Therefore, to assist academic staff in teaching online, online learning clinics were held at most public universities in Malaysia. This chapter reports how the MCO and online learning clinics affect the change in the mindset of academic staff from a public university with the implementation of online teaching and learning. The trainers for the online learning clinic at the university have vast experience conducting workshops on the use of technology for teaching to university academic staff and also to school teachers.

4.1 Online Learning Clinic Syllabus

The syllabus for this clinic was designed by the trainers based on a needs analysis survey. Addressing the needs of the academic staff, the syllabus was designed to be implemented in 3 levels. Each level addressed different skills, and the clinic began from the basic and ended with intermediate skills in online learning. The primary approach of this clinic was hands-on and slow-paced so that participants could master all the contents taught. The same content for each level was repeated in a week. Therefore, participants were given the freedom to choose any date that suited them, and they were free to join as many classes as they wanted. Each level had different themes, as shown below:

a) Synchronous Teaching (31st March-5th April 2020)

Level 1	University QR Code attendance
Content	 How to retrieve attendance
	2. House-keeping when implementing online
	teaching on teleconferencing platform
	i. Choosing a suitable place to conduct
	teaching from home
	ii. Importance of good lighting
	iii. Sitting position when conducting online
	teaching
	iv. Eye-level
	v. Mute button
	vi. Video on button
	3. Introduction to Zoom

	i. Let's know the buttons			
	ii. Let's share your screen			
	iii. Let's create meetings			
	iv. Let's share PowerPoint slides and			
	teaching notes in Zoom			
	v. Attendance via chat room in Zoom			
	vi. How to retrieve chat in Zoom			
Hands-on teaching approach	 Instructors are to explain and demonstrate how to use all the tools during the clinic. Participants are to try to generate the university QR Code for their class attendance. Instructors are to comment on participants' spots to conduct online teaching at home. Participants are advised to find another teaching spot with good lighting if needed. Other participants are to give comments on the new teaching spots, whether they have better lighting 			
	and view.Participants are to try out the buttons and share			
	their teaching slides on Zoom.			

b) Asynchronous Teaching (4 April -11 April 2020)

Level 2	1. Introduction to university e-learning					
Content	Important e-learning tools:					
	i. Assignment					
	ii. Forum					
	iii. Online Quiz					
	2. Introduction to Big Blue Button					
	i. Breakout room					
	ii. Poll					
	3. Introduction to Screencast-o-Matic					
	i. How to create a recorded lesson using Screencast-					
	o-Matic					
	ii. How to share recorded lessons on Whatsapp					
Hands-on teaching	 Instructors are to explain and demonstrate how to 					
approach	use all the tools during the clinic.					
	 Participants are to go to their e-learning and create: 					
	 Assignment 					
	 Forum assignment 					
	 Online Quiz 					
	 Meetings on Big Blue Button & try out the 					
	tools					

- The participants are to prepare three slides of lecture notes before learning how to use Screencasto-Matic.
- Participants are to sign up for Screencast-o-Matic and download the software.
- Participants are to create a recorded lecture session with their video and slides on one screen.
- Assignment for participants:
 - Create a presentation on 'My Best MRO Moment'/ Momen Terindah PKP Ku.'
 - o Time: 15 minutes
 - Things to include: Interesting photos, notes, video.

c) Interesting teaching tools (12 April -19 April 2020)

Level 3	1. Introduction to Webex				
Content	i. How to get Webex account				
	ii. How to activate Webex & host meeting				
	2. Interactive online games (Kahoot and Quizziz)				
	3. Interactive online content i. EdPuzzle				
	ii. H5P				
	iii. Assignments using Youtube video				
	4. Introduction to Edmodo (Basic tools in Edmodo)				
Hands-on teaching approach	 Instructors are to explain and demonstrate how to use all the tools during the clinic. 				
	 Participants are to apply for a Webex account, try to schedule a meeting for their class, and try out all the buttons. 				
	 Participants are to play Kahoot & Quzziz with the instructors and the others and try out EdPuzzle & H5P. 				
	 Participants are to set assignments on e-learning that require students to watch Youtube videos and answe questions. 				

d) What else can I explore?

Level 4	Topics of personal coaching are subject to participants'
Content	requests.
	i. Google Drive
	ii. Google Meet
	iii. Introduction to university e-learning

iv. Introduction to Screencast-o-Matic			
v. Introduction to Zoom & Webex			

Mode of communication

Initially, all participants were informed about the requirements for them to join the clinic. Then, they were grouped into small groups for easy monitoring. Participants who were not interested in joining any level of the clinic were asked to inform the trainers. Daily announcements on the clinic were made on the faculty WhatsApp group. Links for the clinics were shared at the group, and participants were asked to join the clinic by clicking at the links given. All online learning clinics were held via Zoom or Webex teleconferencing platforms.

4.2 Data collection

Throughout the clinic, data was collected using surveys and focus group interviews.

4.2.1 Survey

After every session, all participants were asked to fill up a Google Form which required them to give the information below:

- Personal information: Name, staff no. and e-mail
- Expectations before attending the clinic: Problems/ concerns that hope to be addressed
- Overall feedback on the session: Whether their concerns were addressed by the trainers, comments on the delivery of the trainers, and other things that they hope to learn about online learning.
- Participants' readiness level to conduct online classes independently.

4.2.2 Focus group interview

Focus group interviews were held with selected 13 participants to ask the effectiveness of the clinic, their perceptions on mindset change on online learning, and suggestions to improve the clinic for the future.

4.3 Important findings from the surveys and interviews

Significant findings from the survey and interview with the participants of the online clinic were gathered. The results show that the online learning clinic held for the public university academic staff has successfully changed the mindset of the participants on the use of technology for teaching. Table 4.1 shows different aspects of mindset change before and after participating in the online clinic. The knowledge and motivation for using technology are reported based on their level of ambiguity tolerance. Ambiguity tolerance is defined as 'the tendency to perceive ambiguous situations as sources of desirable' (Budner, 1962).

Table 4.1 Participant mindset, knowledge and motivation for using technology before and after the online clinic

	Before	After
Participant Mindset	 Online learning tools were not important No urgency to use No time to explore No interest to explore Intimidating 	 Start to see the importance of using online learning tools Feel positive and excited to try the tools Feel more confident and willing to spend time to learn and explore View online teaching as non-intimidating
Knowledge and Motivation for Technology	Low level of ambiguity tolerance (0 to 3)	High level of ambiguity tolerance (5 to 8)

At the beginning of the study, the level of ambiguity tolerance among the public university academic staff on online learning was generally low. One participant admitted to having a continuous strong pounding heart while conducting online teaching, and even after the class ended because it was too terrifying for her to use new technology. After undergoing training and executing online learning, a healthy and positive mindset was seen in this participant. Other participants were also reported to have a positive mindset change due to the effectiveness of the online clinic. They were awarded a certificate of completion (as shown in Figure 4.1) for attending the online clinic by the faculty, and this is seen as a motivating factor for them to keep on increasing their knowledge of online learning tools.



Figure 4.1: Certificate of achievement rewarded by the faculty to participants of Online Learning Clinic

The findings of the study indicate that mindset change is possible due to:

- i. the urgent requirement of online teaching and learning implementation (i.e., COVID-19 MCO situation);
- ii. the online clinic held was organized in such a way that it addressed the needs of the participants;
- iii. the effectiveness of the online clinic drives the participants to keep on trying to learn and use the online learning tools;
- iv. the faculty's strong support and commitment to equipping their staff with essential online teaching and learning skills and knowledge

The COVID-19 MCO, the university's instruction to implement online learning, the online learning clinic, and the faculty's strong support and commitment is proven to be the pushing factor for the participants to implement online classes confidently and independently.

The participants were also categorized into different types of learners to understand their knowledge and motivation further to use technology for teaching, as shown in Table 4.2.

Table 4.2: Types of learners

No.	Categories	Description			
1.	I am a real explorer! (Independent learner)	IT literateMotivated learnersLess coaching for them			

May not need to attend many online clinic sessions because they can explore new tools independently

2. I am ready to explore the world!

(Motivated and semiindependent learner)

- Start with very minimum knowledge of online learning
- Show very positive outcome (apply all the knowledge gained during their teaching
- See the importance of attending the clinics because they need to conduct their classes online
- Committed to joining as many classes as they could
- Contact the trainers personally if they need help
- Excited to explore and learn new things because they believe that they have mastered the basics of teaching on an online platform
- 3. I already know it. I don't need you! (Learner with ego issue)
- 4. Don't let me go! (Motivated but still needs more help)
- May be able to use new technologies
- Never attend any online learning clinic class
- In denial that one needs to learn new things continuously
- Start with very minimum knowledge of learning
- Show a positive outcome (try to apply as much as they can)
- May not be able to understand everything but will keep on learning
- Can learn in groups but prefer personal coaching
- Committed to joining classes as / arrange personal coaching
- Still needs a lot of coaching
- 5. I am timid. If you don't mind, can you please help me?
- Start with very minimum knowledge on OL
- Refuse to join because they need personal coaching
- Ask other's help rather than the online learning clinic trainer
- Just keep quiet, keep giving reasons for not implementing online teaching

In general, the majority of the participants (48%) are from Category 4. Most of them are the senior academic staff who do not have vast knowledge on using technology. Category 2 participants (14.8%) are a group of learners who started with a very minimum experience of online teaching and learning. Still, they are highly motivated and independent once they have the grasp of online learning tools. Category 1 (18.5%) learners have a solid foundation on the use of technology. Therefore, they joined the online clinic just to ensure that they can keep up with the current online teaching and learning tools. Learners from Category 5 (14.8%)were hesitant to attend the online clinic conducted but admitted that they need thorough coaching sessions as they only have minimal knowledge and skills in using online teaching tools. Category 3 (3.7%) refused to attend the online clinic on the

assumption that the person is an independent learner. The online clinic is a success due to several factors:

- Trainers have a good rapport with the participants
- The training was conducted at a slow pace to cater for Category 2, 4 and 5 learners
- Trainers were patient in handling different types of learners
- Trainers were responsive in addressing participants queries

Results from the interview also indicate that the online clinic is more effective than the mass lecture and online training sessions conducted by the university because they felt that the delivery was too fast. Those courses were not meant for them as they were all for advanced users. Through the online clinic, participants' knowledge of online teaching and learning has been enhanced as the trainers' approach suits their learning needs.

4.3 Summary

This is a very insightful research as it uncovers many significant findings on the mindset and the knowledge of public university lecturers on the use of online technologies to support online learning. The COVID-19 situation has forced the education sectors to switch from face-to-face teaching to online learning. The faculty's initiatives and strong support have proven to be successful at empowering its academics to be adaptive with online teaching and learning tools. One of the efforts is to conduct a series of online clinics that cater to the diverse needs of academics.

Chapter 5

Online Learning Implementation and Analysis

Nina Diana Nawi and Kew Si Na

5.1 Implementation of Online Learning (OL).

The emergence of the COVID-19 pandemic has forced the academic staff to switch their face-to-face teaching to online teaching. To ensure the effectiveness of online learning implementations, the Faculty of Social Sciences and Humanities (FSSH) UTM has provided all the support needed for the academic staff, as highlighted in Chapter 3: Online Learning Training. The continued support from the faculty and the university in providing training, assistance, and facilitation are found useful in helping the academic staff to embark on their journey in digital education.

In the first two weeks of the Movement Control Order (MCO), before the official online classes started in UTM, a survey was conducted by the university and FSSH to both students and academic staff to track their readiness and feedback on online learning implementation. Using the data, online learning training was planned and conducted for academic staff to conduct online classes. Figure 5.1a and Figure 5.1b show the reflection details of online classes implemented during the MCO by individual academic staff. Generally, academic staff who implemented online learning were positive on the outcomes of their online classes.





Figure 5.1a: Online class implemented during the movement control order by FSSH academic staff

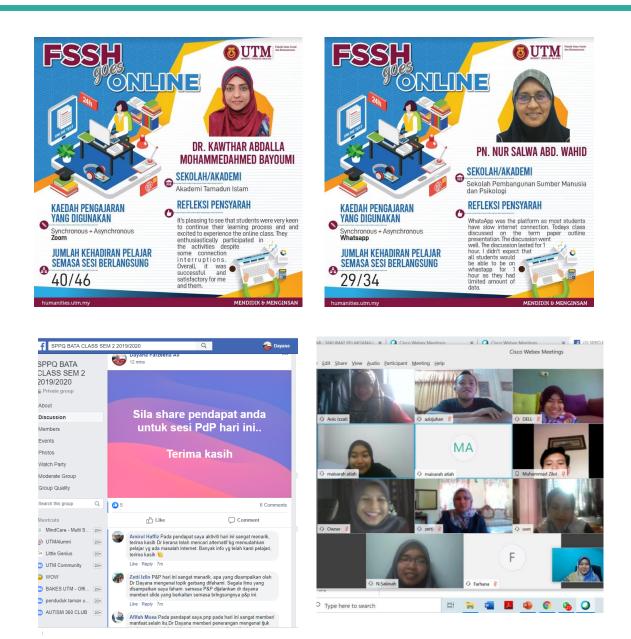


Figure 5.1b: Online classes conducted by FSSH academic staff during the COVID-19 MCO

5.1.1 Student Readiness towards Online Learning Implementation

UTM Institute for Life Ready Graduate (UTM iLeaGue) surveyed to understand UTM students' knowledge on online learning tools, readiness level for online learning and preparedness level to perform online assessment during MCO. Figure 5.2 reflects that from 156 respondents, 42.9% believed that they have a high knowledge level to utilize online learning tools, followed by a moderate level of 34.6%. The data helped the academic staff to plan their online classes.

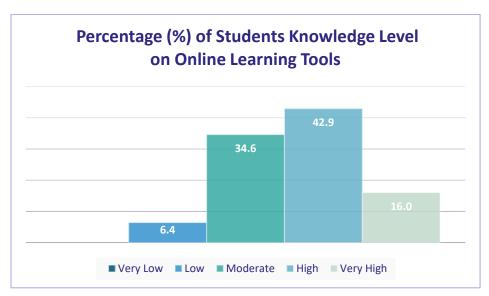


Figure 5.2: Percentage (%) of Students Knowledge Level on Online Learning Tools

Figure 5.3 reflects the percentage of students' readiness level for online learning during MCO. More than 50% of the students have moderate to very high readiness levels. Students with low and very low readiness levels were affected by the technical issues such as living in hometowns with limited access to the internet and living with families where they had to share the internet data with other family members.

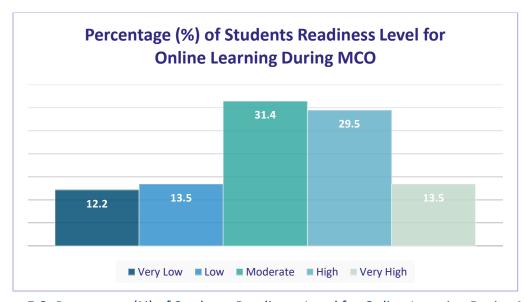


Figure 5.3: Percentage (%) of Students Readiness Level for Online Learning During MCO

Figure 5.4 shows the percentage of students' preparedness level for online assessment during MCO. It is seen that 37.8% of the students were at a moderate level of preparedness, followed by 26.9% of the students at a high level of preparedness. 12.2% of the students indicated low and very low levels of preparedness, respectively.

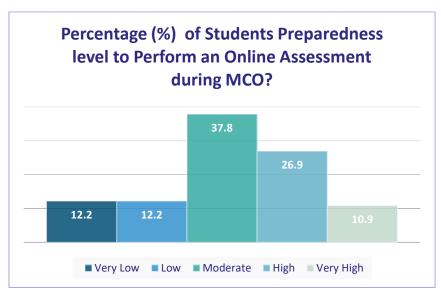


Figure 5.4: Percentage (%) of Students Preparedness Level to Perform Online Assessment during MCO

5.1.2 Academic staff Readiness for Online Learning Implementation

FSSH UTM also conducted various training to support academic staff to conduct their online classes. A survey was given to understand the kinds of assistance needed. From the findings, academicians who needed the support were assigned with a foster sister/ brother who is from the faculty Blended Learning Team to receive one-to-one facilitation. This has been described extensively in the previous chapter on the Online Clinics held by the faculty. Based on the findings gathered, academicians reported positive outcomes from the clinic. For example, Madam Ramona, in Figure 5.5 below, admitted that she had a high level of apprehension on online teaching tools, but after attending the clinics, her apprehension level has reduced. She proudly showed her work on Screencast-O-Matic to the foster sisters assigned to her, which were Dr. Nurhasmiza and Dr. Wan Nur Asyura, and thanked them for assisting her. Figure 5.6 shows the feedback of Prof Yeo Kee Jiar on the assistance given to her by Dr. Najua Syuhada.



Figure 5.5: Mdm. Ramona successfully used Screencast-O-Matic for ULAB 2032 assisted by Dr. Nurhasmiza and Dr Wan Nur Asyura



Figure 5.6: Feedback from Professor Dr. Yeo in regards to the online clinic by Dr. Najua Syuhada

5.2 Findings from Online Learning Implementation

To keep track of the online learning implementation, a survey was conducted by the faculty from April 1, 2020 to April 13, 2020, for the academic staff to be filled after their online class. The form recorded sections, courses, time, online learning methods, online learning platforms, as well as their

reflections on the online classes conducted. The form had helped the administrator of FSSH to keep a record of online classes implemented and to identify further assistance needed by the academicians. The analysis from the survey is presented as follows.

5.2.1 Statistic of Online Learning Implementation

Since the first official implementation of OL during Movement Control Order on April 1, 2020, 98.9% of online learning classes have been implemented to 445 sections for the FSSH undergraduates (Table 5.1), while 100% of online classes were performed for 121 sections for FSSH postgraduates (Table 5.2). Based on Table 5.3, it can be seen that students showed good attendance during the online classes. Out of 1174 sessions conducted, the total number of students who joined the online session is 31140/33355, which makes 93.4% of student attendance. Based on the statistics and a considerable amount of training given in less than a month, it has been proven that FSSH UTM academic staff are now capable of running their class online independently. To date, this data only reflects the online learning implementation of FSSH UTM faculty members from April 1, 2020, until April 13, 2020. The data also excluded the sections from completed modular courses, teaching training, and final year projects.

Table 5.1: Online Classes for FSSH Undergraduates during COVID-19 MCO (1st April -13th April 2020)

Schools/ Academy	Section	Online Learning Implemented by Section	Percentage (%)
School of Education	137	137	98.5
School of Human Resource Development & Psychology	51	51	100
Academy of Islamic Civilization	74	73	98.6
Language Academy	153	153	100
Faculty of Social Sciences and Humanities Kuala Lumpur	35	33	94.3
TOTAL	450	445	98.9

Table 5.2: Online Classes for FSSH Postgraduates during COVID-19 MCO (1st April -13th April 2020)

	J	•	• •
Schools/ Academy	Section	Online Learning Implemented by Section	Percentage (%)
School of Education	86	86	100
School of Human Resource Development & Psychology	14	14	100
Academy of Islamic Civilization	13	13	100
Language Academy	8	8	100
TOTAL	121	121	100

Table 5.3: Overall Hits of FSSH Students during COVID-19 MCO (1st April -13th April 2020)

Schools/ Academy	Total Hits	Hits during OL	Percentage of Hits during OL (%)
School of Education	10756	10108	94.0
School of Human Resource Development & Psychology	8093	7621	94.2
Academy of Islamic Civilization	5860	5487	93.6
Language Academy	8198	7504	91.5
Faculty of Social Sciences and Humanities Kuala Lumpur	448	420	93.8
TOTAL	33355	31140	93.4

5.2.2 Online Teaching Methods Used

Figure 5.7 shows most of the academic staff in FSSH UTM (78.36 %) implemented the synchronous online teaching method in their teaching, while the other 21.64% chose to use asynchronous online teaching. This reveals that the majority of academic staff preferred real-time teaching and interactions with students.

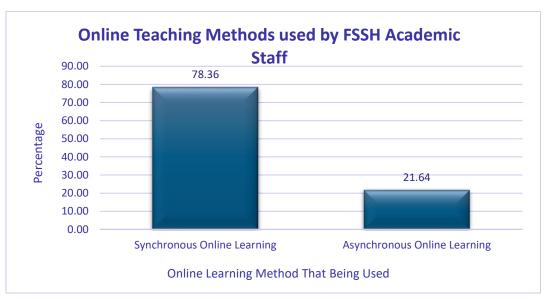


Figure 5.7: Online Learning Methods used by FSSH Academic Staff

As illustrated in Table 5.4, a total of 1174 online classes were conducted by the academic staff. Academic staff from the School of Education held the online class with the highest percentage (39.69%) as it had the highest number of classes. The Faculty of Social Sciences and Humanities Kuala Lumpur had the lowest percentage as it only had 26 classes.

Table 5.4: Online learning methods used based on different school/academy

Sahaal / Asadamy	Synchronous Online Learning		Asynchronous Online Learning		Total	
School/ Academy	Number	arning (%)	Number	earning (%)	Number	(%)
School of Education	394	42.83	72	28.35	466	39.69
School of Human Resource Development & Psychology	151	16.41	60	23.62	211	17.97
Academy of Islamic Civilization	153	16.63	35	13.78	188	16.01
Language Academy	197	21.41	86	33.86	283	24.11
Faculty of Social Sciences and Humanities Kuala Lumpur	25	2.72	1	0.39	26	2.21
Total	920	100	254	100	1174	100

5.2.3 Online Tools

WhatsApp, E-learning, Webex, Zoom, and BigBlueButton were the top 5 online tools chosen by FSSH academic staff. These tools were used in synchronous and asynchronous online learning classes.



Figure 5.9: Top 5 online tools used by FSSH academic staff

Figure 5.9 shows the different types of online tools used by the academic staff for their online learning classes. WhatsApp is the most popular platform, followed by the e-learning forum. The third famous platform is Webex (14%), followed by Zoom (13.7%) and BigBlueButton (11.6%). The academic staff also selected other platforms like Youtube, Google Meet, Telegram, FB Live based on the suitability of the course.

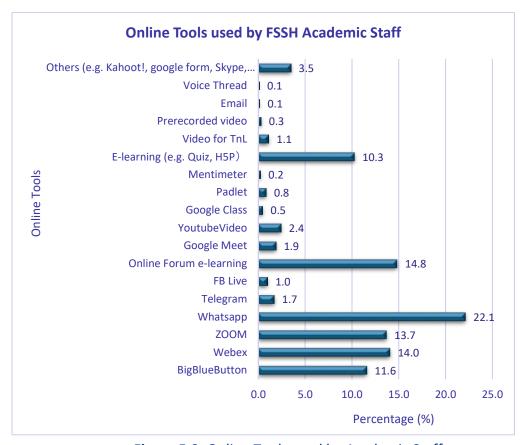


Figure 5.9: Online Tools used by Academic Staff

Summary

It was found that most of the academic staff managed to run online classes successfully and the students were excited to learn new things during online classes. Both academic staff and students also gave full cooperation in order to ensure that their classes ran smoothly. Most online classes ran effectively as the academic staff integrated various online tools to engage their learners. The next chapter will discuss the issues and challenges faced by both academic staff and students during the online learning implementation.

Chapter 6

Issues and Challenges

Nur Hazirah Noh@Seth and Nina Diana Nawi

Work from Home (WFH) has been an idealized working method hoped for by most of the workers regardless of their professions. Imagine having the freedom to juggle between cooking, doing laundry, housekeeping, babysitting, and working from home rather than from the office. For those having a dilemma of sending their kids to nurseries or kindergarten, the idea of WFH is an opportunity not to be missed. Nevertheless, it is a different story when WFH requires a commitment to keep up with workload as well as house chores. Hence, when the Movement Control Order (MCO) was implemented by the government followed by the release of Universiti Teknologi Malaysia's (UTM) MCO WFH Standard Operating Procedure (SOP), and a revised UTM academic calendar, most of the staff have to abide to the current MCO-WFH SOP. Since UTM students are no longer required to attend physical class, academic staff at Faculty of Social Sciences and Humanities, FSSH UTM must, therefore, re-strategize their teaching and learning method by implementing Online Learning (OL). However, some issues and challenges might impede the effort of conducting an effective OL. These issues are not only faced by academic staff, but also the students and their families. Since the world is affected by the COVID-19 pandemic and everyone, including UTM staff and students, are required to stay home, utilization of the internet has significantly increased more than the average daily usage. Based on MyMOHEs statistics, as of March 2020, UTM has a total of 1416 academic staff with a Ph.D. and 29,776 undergraduate and postgraduate students. The MCO period has, therefore, offered an opportunity as well as urged the academic staff and students to practice and implement OL effectively to complete the semester. Nevertheless, the issues and challenges need to be addressed accordingly to ensure a brighter future for OL implementation.

6.1 Issues and Challenges on Online Learning Implementation

FSSH UTM has gathered the responses and feedback among its academic staff on the OL implementation since the first online class conducted on April 1, 2020. The academic staff's reflections from 1174 online learning sessions were recorded from all FSSH departments. A thematic analysis was employed in this study using a three-step process to analyze the responses and feedback obtained and is illustrated in Table 6.1.

Table 6.1: The three-step process of thematic analysis

No.	Steps	Action	
1.	Familiarization	Read and re-read the reflection to get the content	
2.	Coding	Highlight the repeated word, phrases, or sentences – and come up with shorthand labels or "codes" to describe their content.	
3.	Generating themes	Based on the codes, patterns identified were grouped under sub-themes and later reorganized into Theme	

Based on the familiarization and coding steps, it is found that the sub-themes emerging from the reflections have addressed the issues and challenges during OL Implementation. The sub-themes are class execution, network coverage, student's feedback, academic staff's feelings, and efforts. Table 6.2 shows the evidence from the reflections that were categorized based on the sub-themes.

Table 6.2: Sub-themes emerged from the reflections

Table 0.2. Sub-themes emerged from the reflections				
Sub-Theme	Evidence from the reflections			
Class execution	 The class ran smoothly even when students accessed classes from rural areas such as Pahang and Kelantan. The class ran smoothly. The 2-way discussion and activities were conducted successfully. PPT slide and doodle on screen sharing were smooth. Students' voices were clear. There was no problem in online class execution Students were able to follow my lecture, which I videotaped. They find it very useful as they are ready to go to the part that they missed or they don't understand. It is challenging to do practice/drill through an online class, as we couldn't observe the student's reaction in real-time. Online Learning via BBB was carried out smoothly & effectively with a good internet connection today. However, the usage of the webcam was purposely disabled to avoid slow internet connection among us. 			
Academic staff Feelings	 In general, I enjoy synchronous and asynchronous online classes through Zoom and WhatsApp. I've prepared notes and shared them with students. I also provided after-class training in an e-learning forum and a Mentimeter to get students' feedback. It's pleasing to see that students were very keen to continue their learning process and excited to experience the online class. They enthusiastically participated in the activities 			

- despite some connection interruptions. Overall, it was successful and satisfactory for them and me.
- Because of internet data limitation, it was hard to ask questions impromptu live. Hence, I had to type in the public chat or Whatsapp group. This took time and was quite frustrating.
- It was pretty challenging at the very beginning of the class. Though I have attended the training on BBB about 2-3 times, it still took me a while to pick up the necessary skills, such as using the functions in BBB to share presentations and create polls. However, towards the end of my class, it turned out pretty well. However, I found out later that I am not able to import the recorded session of my class. I need to find out what went wrong.
- I was worried and concerned about starting online learning, as I did not know how to do so.

Academic staff Efforts

- I have always designed interesting activities to be incorporated into my lessons. Doing this activity remotely from home has taken away the opportunity to develop interactive, fun activities for the class. But I will try
- I have learned to be more interactive through practical teaching with technology. The new ways of teaching using different platforms allow my students to discover the answer themselves via forum discussion and explore how to use tools such as Facebook, Quizizz, and Webex online platforms to become more independent learners.
- The majority of students submitted the work given except for two students who seemed to have problems with their internet connection. However, I have contacted these students personally and utilized other ways to make sure that they can participate in the LnT.
- The classroom ran smoothly with both synchronous and asynchronous teaching approaches. Students are provided with lectures using Zoom, and students were given assignments on discussion forums in the elearning and reflection paper using menti.com. There are several students whose internet line was interrupted; they were monitored via Whatsapp and were provided with pre-recorded recordings in MP3 format to ensure that students do not miss out on the discussion.
- I did a short induction talk and briefing about the structure of the class at the beginning of the class (Webex). I uploaded a prerecorded video of the lecture together with other necessary files for e-learning. The materials were put in e-

learning and a video related to the topic of discussion that was shared from YouTube. Forums for students' discussion took place in e-learning, and PowerPoint slides, and a video were used for students for further reading, while the feedback was provided through Padlet.

• Disruption due to internet connection problems and switching from Webex to BBB was smooth overall, and learning objectives have been achieved. However, one international student is staying outside the campus and near UTM continuously facing problems with low bandwidth, and it is stressful for her. This is my second online class with them, and I have reduced the contact hours. Even though only one student is facing great difficulty with an internet connection, I will make sure that she is not left behind. The textbook and e-learning materials are sufficient for her. I will also reduce tasks online. Sometimes for students who are highly committed and hardworking, they may feel frustrated for not being able to follow their peers. I will always communicate with my students to know their current status and remind them to put their well-being as the top priority.

Students Feedback

- Students are very excited, especially for those using BBB for the first time. It was a great online session. It's easy to set up, video & sound was excellent.
- Students are enthusiastic and cooperate well
- Students give positive feedback. Even there is some connection problem, but the students get most of the points
- Some of the students were upset because of the web lagging due to a weak internet connection. However, they all made a considerable effort to join and participate.
- Students are happy with Webex because they could see their friends and me clearly

Network Coverage

- The **internet not stable**, and students logged out and logged in a few times.
- The student who could not attend the lecture was due to **poor Internet connection.**
- The synchronous class could only be done for about 30 minutes due to poor connectivity
- Internet network problem that interrupted the learning process
- The class went well. However, I was disconnected twice from BBB due to my poor internet connection.
- Three students could not get on board. Some **got kicked** out of zoom during class because of unstable connection.

Technical Issues

- Some other students were off and on during the class due to weak Internet lines and old equipment (computer).
- The mid-term test was conducted during this class. We faced the same technical problem; however, the experience from the day before in other classes, I managed to minimize the shortcomings and overcame it.
- Some students do not have a webcam. So, I cannot see their faces. And, all students did not switch on their webcam.
- Students' computers cannot be used and hang during synchronous sessions.

Limitation on practical activities

- Programming learning activities are limited because students do not have the hardware to make wiring and programming real (equipment is only in the lab).
- Learning activities on programming are limited because students do not have the hardware to make wiring and programming real (equipment is only in the lab). However, the **Tinkercad simulation** can be used, but it is limited, and I had to change the content of the lesson.

Students Attitude

- Having an online class, let alone an asynchronous lesson, requires strict monitoring. I have to keep reminding students to complete the lesson and tasks.
- Some students woke up late and attended the class late. One student still had difficulties in reaching the e-learning platform fully.
- Students did not attend because they did not remember they had class.
- Students came late to the class, even when the reminder sent one day earlier.

Method of Online Class

- The lesson went well. I find the asynchronous method for an online class is more effective as this course involves a lot of writing tasks. So allowing them some time and give them feedback is more effective.
- The class went well with full attendance. Students were quite responsive. However, I need to go a bit slow for the synchronous sessions. I tend to go a bit fast as I am worried about using too much of the student's data.
- The lesson went well, and no technical problem faced. I used asynchronous (WhatsApp and E-Learning), and student's participation/response is better compared to when I used the synchronous method.
- Student's internet coverage is weak, so synchronous learning is not applicable.

Health and Safety Issues

- My hand started to feel numb due to long hours in front of the computer to prepare the online resources
- A student was allowed to leave class 20 minutes earlier because of thunder and lightning at the residence. In future class planning, academic staff will students will be allowed to leave class in advance of their safety.
- During rainy days where there were lightning and thunder, few students were unable to continue the class.

Based on the sub-themes that emerged from the 1174 reflections and feedback received, the sub-themes were categorized, as shown in Table 6.4.

Table 6.4: The theme that addresses the issues and challenges during online learning implementation

Online Learning	Online Learning Experience	Academic Staff Efforts
Implementation		Academic Staff Feelings
		Class Execution
		Students Feedback
	Challenges	Network Coverage
		Technical Issues
		Limitation on practical activities
		Students Attitude
	Recommendation	Suitable Methods of Online Learning
		Health and Safety Issues

Based on the thematic analysis, the three main themes were derived. The issue will be discussed accordingly.

6.2 Online Learning Experience

For academic staff, preparing OL is more tedious and time-consuming as compared to preparing the conventional face to face classes. Everything needs to be ready before the course begins. All the resources need to be disseminated among the students, with accessibility in mind. Careful planning is essential to make sure that OL is conducted within the stipulated time. For example, a two-hour session planning, as shown in Figure 3.2 (Chapter 3: Online Learning Training), starts with taking the attendance until class presentation. The QR code attendance, the interactive slide presentation, the platform for

students' activity in e-learning, the short question for scaffolding, and the active learning implementation are all the required resources needed to be prepared before the class. Not only that, but academic staff also need to ensure the readiness of the students to ensure that students can learn and no one left behind. Based on the readiness survey, the academic staff needs to re-strategize their methods of learning to meet with student condition. Some of the academic staff need to prerecorded their session and upload in e-eLearning and YouTube to ensure that the students can still learn regardless of the challenges faced by the students. This is all the effort by the academic staff to ensure the class was run smoothly.

On the other hand, based on the data from the early training session before MCO implemented, some of the academic staff are reluctant to shift from the conventional method to online learning. This has made the online learning implementation unfeasible as if the process is against the original teaching practiced in the traditional face to face classes. Despite the hundreds of available interactive online learning tools to be used and embedded in an online learning session, it only manages to target young and vibrant academic staff. They have been using a few online learning tools. The challenging part is towards more senior academic staff and those with low technology literacy. However, the blessing in disguise of this pandemic is the opportunity to explore the various interactive online learning tools. The faculty realized the challenges faces by the academic staff. Hence FSSH has initiated the training and online learning clinic, as discussed in chapter 3, which had resulted in mindset change among a particular group of the academic staff as addressed in Chapter 4. Based on the reflection, it could see that most of the academic staff are now enjoy and excited to do the online learning session. They explore the available application and software to accommodate the teaching. Academic staff also pleased to observed the student is keen and enthusiastically attends the online class. However, it is undeniable the network coverage may cause frustration among both academic staff and students as it had affected the LnT process. The students may not be able to comprehend the lesson due to the technical problem entirely. Regardless of the challenges and issues on the online learning experience, most of the students and academic staff are very happy and enjoy the session. The sessions can be run effectively, although students stay in remote areas in Pahang and Kelantan. The screen sharing, students' voice, two ways discussion, and activities were successfully executed during the online learning class.

6.3 Challenges of the Online Learning Implementation

The most crucial elements to ensure effective online learning implementation is network coverage and internet access. Nothing could get even worse than having a technical issue and a slow internet connection at the same time. Without proper access to the internet for both students and academic staff, it will disrupt the LnT session. There were some cases where the students need to travel a few kilometers just to buy the data for online learning sessions. Hence technical issues of internet access are a challenge to be addressed for better online learning implementation.

The other challenges are in the delivery of practical subjects. The only LnT approach for practical subjects is converting them to the theoretical subject via online learning. Nevertheless, inadequate tools and improper environment are among the challenges faced by both academic staff and students. There are subjects where the students physically need to perform a specific action to achieve the learning objectives. However, during this pandemic, the learning objectives need to be adjusted, as long as it is aligning with the program learning outcome. It is quite challenging to design and plan online learning to meet the fixed learning objectives specifically. For example, one of the learning objectives for practical subjects is the students should be able to interact independently with welding equipment and tools. The academic staff needs to design self-directed learning ensuring that even though the psychomotor skills cannot be assessed, the students' cognitive on the understanding of how each equipment works and how to use them is delivered during online learning. Despite the challenges, it gives room for academic staff to be innovative in designing the LnT process. This MCO has allowed some academic staff to explore their potential by using varied methods from hands-on and simulation.

The other challenges that need attention are the student's attitude towards online learning implementation. Undeniably, most of the class presented the full attendance of the students throughout the online learning session. They committed and gave total concentration for the LnT session. However, as time goes by, there are some cases where some of the students forget about their class schedule, start coming late or even worst, did not attend the online learning class. The reasons behind are due to the student's attitude as a result of unbearable tasks and assignments, commitment to serve the family, and poor time management by the students.

6.4 Recommendation on the Online Learning Implementation

Even though the online learning tools and platforms are easily accessible on the internet, the challenge to create online learning classes for students with a minimal or low bandwidth internet connection needs to be prioritized. Based on the study, the more effective approach for the low bandwidth internet access would be using an asynchronous session or task-based method. These two approaches allow the students to participate or complete the given task whenever the internet can be accessed. In contrast to synchronous sessions, asynchronous and task-based approaches require more time to prepare. All the materials need to be disseminated among the students before class, and explicit instruction should be given to guide the students on what needed to be done during online learning. Academics staff need to ensure that the activities prepared are scaffolding the students' understanding, and at the same time, interactive enough to create an active learning environment and easily accessible by the students in a remote area with a minimal and low internet connection.

By using conventional face to face as compared to OL, the facial expressions and body gestures will help the academic staff to know the students' responses; either they are bored, sleepy, or feeling enthusiastic. Nevertheless, with the asynchronous session, academic staff required skills to conduct various activities, as well as alternative assignments with an added value to ensure the learning objectives are well-achieved. All academic staff should have known that all learning theories, either

constructivism theory, self-directed learning, or independent learning, should and could be applied during online learning. Only the design of LnT in the asynchronous session is the biggest challenge to be catered, especially when the student opts for a session to suit their low bandwidth internet connection.

Since the planning and preparation of the online resources are tedious, as discussed previously, and this includes development for interactive videos to increase in-class participation during online learning. The academic staff should put health and safety first, before interactive activities and assessment. The long hours in front of the computer might harm their eyes, body gestures, spine, along with encountering a high risk of other nerve-related diseases such as carpal tunnel syndrome and cubital tunnel syndrome. Extra precaution should be taken by these academic staff to ensure that they will not jeopardize their health during this pandemic state. Another concern is the safety issues during the online learning implementation. Since the online session can be run ubiquitously, hence some of the student's locations may be affected by the bad weather. Thus, academic staff shall allow the students affected by the lightning and thunder to dismiss early to ensure the safety of the students.

Summary

The efforts of FSSH academic staff to ensure OL runs effectively have received appraisals and positive feedback from the students. Nonetheless, the challenges faced by the academic staff on the network coverage, technical issues, limitation on practical activities as well as students' attitudes needed attention. It is overwhelming to observe that the online learning class were conducted despite these challenges, which allow and boost academic staff to be creative in exploring new methods of teaching and bridging the gap of LnT. The ultimate goal is to ensure that the learning process takes place effectively. This report is, therefore, essential for the faculty to take necessary actions to provide a better future of online learning. Discussions on the ways forward are presented in the next chapter.

Chapter 7

Way Forward

Mohd Shafie Rosli and Zaidatun Tasir

Effective online learning (OL) remains a persistent and pervasive challenge for years. OL is available at various education levels and is accessible to multiple generations. However, its impact is somehow overshadowed by the consistent practice of the face-to-face classroom. A conventional method, such as deductive content delivery, is useful at some point for a specific subject. Yet OL is capable of complementing it. Although practical hands-on learning such as laboratory work and scientific experiments may not replaceable by online learning, the potential of OL is tremendous.

The nature of education to cater for Millenials and Generation Z is different from past generations. They may prefer online education given the right situation (Yu & Suny, 2020; Maleesut, Piyawattanaviroj & Yasti, 2019; Tick, 2019). The utilization of ICT in their daily tasks has become their routine (Bowe & Wohn, 2015; Prensky, 2010), and using technology in the learning and teaching (LnT) process helps to boost their motivation (Thang et al., 2014). The perception between them and the current acceptance of online learning among educators is distinctive (O' Bannon & Thomas, 2014; Kite et al., 2020). These differences, if not handled properly, may lead to an imbalance of challenges and opportunities for the implementation of OL.

The implementation of OL during the MCO period serves as a valuable experience for educators to draft useful settings for OL. OL is not only capable of supplementing the needs of the new generation, but to render an inclusive OL, and provide a balance between the generation gaps and the varying levels of social and economic backgrounds of the students. OL is improving and has been more refined after the pandemic as the landscape of post-COVID-19 education has changed and will never be the same in the future.

There are specific actions that higher educational institutions need to take to support OL. Given that the academic staff of FSSH UTM has shown a positive change in terms of their readiness and acceptance towards implementing OL in their LnT, it is timely for FSSH UTM to digitize education to ensure more extensive accessibility.

7.1 Embrace the Impact of Change

The approach of teaching in universities has not changed much in the past decades. The lecture-based approach is still a dominant idea of what education is. Yet, the global crisis of COVID-19 might have an impact on the nature of disseminating knowledge in the coming years. Soon, OL is the new

norm for FSSH UTM and other higher institutions alike due to its flexibility, and it's potential to help minimize cost and eliminate the geolocation barrier.

During the MCO period, FSSH UTM has opened counter services that are available through online mediums to cushion the impact on students. It soon reduces the need for students to travel to the faculty for submission of forms or inquiries.

The nature of postgraduate supervision and thesis submission at FSSH UTM is different before the MCO period. Students seem to enjoy the flexibility of location, and some even choose to return home while finishing their final semester. Thesis submission for viva is now available via online medium, and better yet, the viva is now totally online during the COVID-19 crisis. The migration to use online platforms to conduct viva sessions and thesis submissions has been successful at ensuring UTM's continuous effort to enhance the viva process using technology.

Formal academic affairs, such as meetings, workshops, and discussions, are now online. It does not only expose academic staff to a new way of interaction but also instill the potential and more effective ways of utilizing and maximizing online collaborations.

7.2 Digital Nomads

Online collaboration is a thing of the future. The world has now been exposed to a new way of hiring employees in which employers are now hiring workers without the need for their physical presence in the office. These employees are referred to as Digital Nomads (Muller, 2016). The workforce is currently not working in a conventional office and has become mobile as well as location-independent with the authority to decide when and where to work (Muller, 2016). According to Mancinelli (2020), in the age of digital nomadism, workers can make use of online technology advancement to work remotely from the comforts of their homes and explore the world at the same time. The bracket of digital nomads is emerging, ranging from digital entrepreneurs, corporate workers, and free-lancers (Arole, Granter & de Vaujany, 2020).

As the COVID-19 pandemic forced universities to implement OL, it is high time and the perfect window for the educational institutions to explore more on the concept of digital nomadism. As academic staff is working from home, implementing OL may facilitate them to pass their course content and lectures to students. Students may get a better perspective of what lies ahead in the real-world. Digital nomadism can act as a balance mechanism to achieve a balanced life between work, leisure, and travel (Reichenbenger, 2017), which is highly appealing to the Millenials and Generation Z. It might prepare the students to embrace the impact of the Industrial Revolution (IR) 4.0 and to prepare themselves for challenges in the workplace.

7.2.1 Open Distance Learning (ODL)

In 2019, the School of Education was among the first school in UTM to offer Online Distance Learning (ODL) as a mode of study. OL sessions are recordable. Synchronized learning is accessible throughout the semester. It provides dynamic learning materials to support self-directed and self-paced learning. The fundamental idea of the mode is to eliminate the need for physical lectures and to provide flexibility for students to study without leaving their homes. It seems that ODL is the next big thing in education. The hurdle of COVID-19 pandemic renders ODL as a versatile and futuristic mode of study. As online training has proven to be practical, the demands for ODL might escalate soon.

FSSH UTM is in the process of preparing more ODL to be offered to more students who are comfortable with this mode of learning. At the same time, the academic staff has become more accustomed to OL and the use of technology in their LnT. FSSH UTM is more than ready to shift its programs, especially postgraduate programs for matured and working students, to orient towards this mode of learning.

7.2.2 Digital Skills in Educational Technology

Employers might soon need the demand for skills in online collaboration. However, the workplace settings and skill sets required may be different depending on the sector they are in. The industry is actively innovating for efficiency and productivity. The extensive market for the candidate with skills in online collaboration and learning at the workplace has emerged (Schaefer et al. 2019; Schaefer et al. 2018). Online communication is imperative in the informational age workplace (Darics and Cristina Gatti, 2019), making Work from Home (WFH) as practical in the future. For a successful adaptation of graduates in the work market, FSSH must, therefore, equip students with these skills to become more competitive. Through online learning sessions, students have now embraced educational technology. It indirectly trains them to deal with technology, therefore, preparing students to become technologically literate graduates.

For industrial training students at FSSH UTM, they are encouraged to WFH. They are asked to complete their tasks online if their companies allow them to work from home to complete their industrial training. This is to train the students to become more technologically savvy in the future. The same concept also applies to teaching practice students. They are asked to conduct online teaching with their students. This is to prepare them with the skills needed when they become teachers in the future so that they can adapt themselves well with the ever-changing situation when they graduate later.

7.2.3 Better Access to ICT Infrastructure for Students and Staff

Access to ICT infrastructure needs to address two different but interrelated issues. First, there is a need to improve the quality of the internet connection (Idrissi Jouicha et al., 2020). Second, the internet coverage area needs to be wider (Idrissi Jouicha et al., 2020). As the nature of higher learning institutions caters students from various geolocation, the quality of the connection and access to the internet may vary from one place to another. Having a weak or unstable internet connectivity will give a direct implication to the intuitiveness of OL (Akugizibwe & Ahn, 2020). It hinders effective synchronize communication, renders a barrier towards an ideal knowledge delivery mechanism.

Higher education institutions need to ensure proper Internet coverage, stable connectivity, and cybersecurity in the campus. It catalyzes the implementation of the development that matches the scale of the physical infrastructure of the university as a lack of support creates a barrier towards successful OL (Attardi & Rogers, 2015). Computer laboratories should be equipped with suitable computers and Wi-Fi. For lecture halls, software and hardware for OL are necessary. The design of the lecture hall must be revised and accelerated in the construction of future classrooms. UTM is working on it through the idea of creating a center for future classrooms.

7.3 Essential elements for the change

To ensure change could happen, training and support of academic staff is essential. This is to minimize the gap between the academic staff and also ensure that the students could be properly supported.

7.3.1 Training and support for academic staff

As ICT is as exciting as it should be, it relies notably on training. The human factor should also be taken into consideration while planning for OL. At FSSH UTM, the faculty has taken proactive measures to provide at least three sessions of online learning for the 20192020 Semester II session. To support the idea, FSSH UTM has organized a series of training to academic staff on how to conduct OL. These trainings have tremendously helped and empowered FSSH academic staff to do OL during the MCO period and hopefully in the future.

As the university decides for the implementation of OL, the effort is showing its impact. Academic staff at FSSH UTM are now ready to conduct OL effectively. They know how to use OL media subscribed by the university, such as BigBlueButton and Cisco Webex. The effort continues as FSSH UTM organizes more sessions via online medium during the MCO period. How Whatsapp and Facebook could be used as a support to OL is also delivered to them. It shows how necessary training is in ensuring a successful implementation of OL.

To ensure academic staff receives immediate assistance when needed, FSSH UTM has appointed a blended learning task force with the responsibility to facilitate and guide academic staff who are facing technical difficulties. Some experienced OL practitioners are tasked as a virtual help desk for the faculty members.

7.3.2 Minimizing the Generation Gap

Conducting OL may prove to be challenging to academic staff, as senior academic staff lacks the experience in embracing newer technology. While students are excited with OL, some academic staff may face difficulties with technical glitches (Chen, Dobinson & Kent, 2019). The discrepancy between student readiness and academic staff hesitations in using technology in LnT might affect effective teaching due to the constraints and issues encountered by academic staff. Students show great interest in communication using the chatting facility provided by the OL medium. Academic staff may be unable to focus on the chatting, which is overloaded with messages while the Z and Millennial generations hope for instant feedback from their academic staff (Prensky, 2001). Mutual interaction in online learning is imperative in ensuring effective knowledge construction (Ouyang et al., 2020). Solving this issue needs coordinated action and innovative techniques in ensuring academic staff and students can synergize and create a strong bond of interaction during OL. A sharp focus on closing the gap is necessary, which can be addressed through training and demonstration. It requires a shared sense of digital communication between students and academic staff.

7.3.3 Inclusive Online Learning

Higher learning institutions need to ensure that the inclusiveness of OL to all students is a significant priority. The socioeconomic factor is essential in implementing OL (Dey & Bandyopadhyay, 2018). An inclusive OL shall not burden students and their families financially. Without considerable attention to the social and economic background of the students, the objective of OL might not be achieved. Sustainable education from the aspect of financial constraints needs to be addressed. Application of multiple OL platforms (e.g., Whatsapp, Facebook, email, and SMS) and asynchronous sessions such as YouTube and the online forum will significantly improve the inclusiveness of OL.

7.3.4 Cost Minimization for Students

The cost of Internet data is among the primary concern of students who are at home during the COVID-19 crisis. Data optimization is achievable through asynchronous learning using YouTube and Facebook Live. Videos posted in e-learning render as accessible to students with limited data once they obtain a suitable access option. Students can control the quality of such videos to meet their need for optimum data usage. Lecture notes and learning materials, if uploaded to e-learning, give flexibility to

students to use their Internet data. These measures will, therefore, lead to cost minimization for the students.

7.4 Online Learning Repository and Resources of OL

In order to ensure sustainable implementation of online learning in FSSH, the learning ecosystem needs to be comprehensive and integrated. Learning ecosystem encompasses people, content or resources, technology, culture and strategy. At FSSH, we believe we have covered most of the components especially on preparing people with skills in conducting online learning. However, we believe to maintain the momentum of online learning usage among lecturers and students, learning resources should be setup systematically at the faculty.

Learning resources are one of the important components to assist the sustainability of online learning in higher education. Therefore, FSSH will set up an online learning repository and resources of Online Learning to support LnT among lecturers and students in the future. The repository will be conceptualized based on lecturers and students as content curators for their own LnT materials. The concept will reassure the sustainability of the repository and also accountability of users; lecturers and students. The repository also will be based on Digital Learning Object's principle; chunk, reusable, plug and play, manageable. Through those concepts, the repository will be updated dynamically by the end users.

The repository will consist of synchronous recorded video of LnT sessions through WEBEX, Zoom, Google Meet etc., lecture notes (ppt slides with/without narration, self-recorded video or audio, Whatsapp images consist of instructions, etc.) learning activities, student's presentation, samples of student's works for references, etc. Through the online repository, learning and teaching process will be enhanced since students and lecturers can easily access the learning materials at anywhere and at anytime. The need of this online repository is aligned with the Gen-Z learning and lifestyle where everything must be digital and online for easy access.

The repository will be uploaded into UTM Cloud server under UTMDigital. The existence of the repository will assist students who are not able to join the synchronous LnT sessions due to limited Internet access. The repository also will support the emergency remote teaching and learning due to pandemic outbreak such as what we are facing right now with the COVID-19 situation. It also acts as an important initiative at FSSH to prepare all users; lecturers and students; for Open Distance Learning in the future with the "new normal" of LnT setting at HiEd in Malaysia. The new normal of LnT at HiEd has shifted the learning spaces from "brick-and-mortar" classroom to totally online, from group F2F to individualized setting. Not only learning spaces, the responsibilities of LnT also have been shifted from lecturers to students, their family and communities. So be ready for the changes

and transformations and let us together at FSSH take it as a challenge that will increase our scholarly thoughts and roles in academia.

Summary

OL has opened up a wide range of possibilities for higher education. The MCO period and the COVID-19 pandemic have enabled and accelerated OL, thus pushing a new norm for the higher learning education landscape. FSSH UTM is committed to widening education access through OL as its academic staff is more than ready to embark OL through ODL, blended learning, online oral examinations, online final examinations, virtual meeting, training, forum, and supervision, as well as an online teaching practice and industrial training. This report has shown the capability of FSSH UTM academic staff to digitize higher learning education, and we are ready to embrace the future through a positive and growth mindset change.

References

- Akugizibwe, E. & Ahn, J.Y. (2020). Perspectives of Effective Integration of e-learning Tools in University Mathematics Instruction for Developing Countries. Education and Information Technologies, 25 (2), 889 903.
- Arole, J., Granter, E. & de Vaujany, F.X. (2020). 'Becoming Mainstream': The Professionalisation and Corporatisation of Digital Nomadism. New Technology, Work and Employment. 35 (1), 114-129.
- Attardi, S.M., & Rogers, K.A. (2015). Design and Implementation of an Online Systemic Human Anatomy Course with Laboratory. Anatomical Science Education. 8 (53 62).
- Bowe, B.J. & Wohn, D.Y. (2015). Are There Generation Differences? Social Media Use and Perceived Shared Reality. Proceedings of the 2015 International Conference on Social Media & Society. ACM Press, 1-5.
- Chen, J.C., Dobinson, T. & Kent, S. (2019). Academic staff' Perceptions and Experiences of Blackboard Collaborate as a Distance Learning and Teaching Tool via Open Universities Australia (OUA).

 Open Learning. Article in Press.
- Darics, E., & Cristina Gatti, M. (2019). Talking a Team into Being in Online Workplace Collaborations: The Discourse of Virtual Work. Discourse Studies, 21 (3), 237 – 257.
- Dey, P. & Bandyopadhyay, S. (2018). Blended Learning to Improve Quality of Primary Education among Underprivileged School Children in India. Education and Information Technologies, 24 (3), 1995 2016.
- Idrissi Jouicha, A., Berrada, K., Bendaoud, R., Machwate, S., Miraoui, A. & Burgos, D. (2020). Starting MOOCs in African University: The Experience of Cadi Ayyad University, Process, Review, Recommendations, and Prospects. IEEE Access, 8 (17477-17488).

- Kite, J., Schlub, T.E., Zhang, Y., Choi, S., Craske, S. & Dickson, M. (2020). Exploring Academic staff and Student Perceptions and Use of a Learning Management System in a Postgraduate Public Health Environment. E-Learning and Digital Media, 17 (3), 183 198.
- Maleesut, T., Piyawattanaviroj, P. & Yasri, P. (2019). Gen X STEM Teachers' Perceived Usefulness and Challenges of a Blended-Learning System. ACM International Conference Proceeding Series. 104 106.
- Mancinelli, F. (2020). Digital Nomads: Freedom, Responsibility and the Neoliberal Order. Information Technology & Tourism. Article in Press.
- Muller, A. (2016). The Digital Nomad: Buzzword or Research Category? Transnational Social Review. 6 (3), 344 348.
- O' Bannon, B.W. & Thomas, K. (2014). Teacher Perception of Using Mobile Phones in the Classroom: Age Matters! Computers and Education. 74, 15-25
- Ouyang, F., Chang, Y.-H., Scharber, C., Jiao, P. & Huang, T. (2020). Examining the Instructor-Student Collaborative Partnership in an Online Learning Community Course. Instructional Science. 48 (2), 183 204. Prensky, M. (2001). Digital Natives, Digital Immigrants. On the Horizon. 9(5), 1-5.
- Prensky, M. (2010). Teaching Digital Natives: Partnering for Real Learning. Thousand Oaks, CA: Corwin Reichenberger, I. (2017). Digital Nomads A Quest for Holistic Freedom in Work and Leisure. Annals of Leisure Research. 21 (3), 364 380.
- Schaefer, T., Fabian, C.M. & Kopp, T. (2019). The Dynamics of Online Learning at the Workplace: Peer-Facilitated Social Learning and the Application in Practice. British Journal of Educational Technology. Article in Press
- Schaefer, T., Rahn, T., Kopp, T., Fabian, C.M. & Brown, A. (2018). Fostering Online Learning at the Workplace: A Scheme to Identify and Analyse Collaboration Processes in Asynchronous Discussions. British Journal of Educational Technology. 50(3), 1354 1367.
- Thang, S.M., Nambiar, R.M.K., Wong, F.F, Mohd Jaafar, N. & Amir, Z. (2014). A Clamour for More Technology in Universities: What Does an Investigation into the ICT Use and Learning Style of Malaysian "Digital Natives" Tell Us? The Asia Pacific Education Researcher. 24 (2), 353 361.
- Tick, A. (2019). An Extended TAM Model, for Evaluating E-Learning Acceptance, Digital Learning and Smart Tool Usage. Acta Polytechnica Hungarica, 16 (9), 213-233.
- Yu, E. & Suny, C. (2020). Student-Inspired Optimal Design of Online Learning for Generation Z. Journal of Educators Online. 17 (1)





A REPORT ON FSSH UTM'S EXPERIENCE TOWARDS DIGITIZING EDUCATION

Copyright © 2020 Faculty of Social Sciences and Humanities Universiti Teknologi Malaysia