



**1st ONLINE TEACHING
ENHANCEMENT AND LEARNING
INNOVATION CARNIVAL (eTeLIC)
BOOK SERIES**

ECLECTICNOUS APPROACH IN LEARNING





ECLECTICNOUS APPROACH IN LEARNING

Editors:
MHD HAFIZ KARAMI MHD ZAIN
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PREFACE

This book is a serial collection of teaching and learning (TnL) innovations from the competition of *Teaching Enhancement and Learning Innovation Carnival 2020* (eTeLIC'20). It is the first-ever virtual carnival organised by the Centre for Academic Excellence and Development (CAED), Deputy Vice-Chancellor (Academic & International) Office, Universiti Malaysia Kelantan (UMK) on 21 September 2020 through an online platform, Google Meet. 114 entries from higher educational institutions and schools all over Malaysia had participated in the carnival. The carnival fits with the current situation that encourages remote teaching due to the COVID-19 crisis with the theme of *New Norm: Cultivating Online Learning*. Educators are massively affected, and they critically need to learn, unlearn, and relearn to remain sustained and relevant in the inevitable paradigm shift to online learning. This book has 13 innovations that focus on e-assessment in teaching and learning with constructive alignment that takes into account cluster determination following MQF 2.0. The contributors of the book share their current Teaching and Learning (TnL) innovations, ideas, as well as best practices that are critically needed to be adopted and adapted, especially in the midst of the COVID-19 pandemic. The uniqueness of each approach is that combining a few Web tools such as Wakelet, Trello, Padlet, Google Suite, YouTube, Wix, FlipGrid, Kaizena and others to create all assessments can be monitored online. This e-assessment can be applied across all disciplines, either in Science or Social Science. The success of teaching and learning (TnL) can be measured in terms of CLO achievement, students' feedback, Teaching and Learning Evaluation and improvement of technologies. This book perhaps can be a guidebook not limited to only lecturers but also to other educators such as schools, matriculations, polytechnics, and other institutions.

Editors

Mhd Hafiz Karami Mhd Zain

Mohammad Affiq Kamarul Azlan

Chapter 3:

TELEGRAM AS A TEACHING AID FOR SUPPORTING MOBILE TEACHING AND LEARNING

Nurashikin Suhaili

Learning Outcome(s)

Cluster 1 and 2

Course Area(s)

Science Communication



INTRODUCTION

Whilst there are many online quiz-based tools available in the form of web or mobile applications, there remains a need for applications that can provide not just a space for quizzes but also a room for discussion in a user-friendly way with low data consumption. One of the simple yet useful applications that has the aforementioned criteria is Telegram, which is known as a mobile instant messaging (MIM) application. Based on a recent report by Tang and Hew (2020), to date, MIM in general still remains the least explored technological platform for education. Hence, there is a need for the investigation of MIM applications for educational purposes.

The recent advancement of mobile technology has significantly changed the way individuals, including teachers and students, interact.

It is projected that messaging applications will be used by 2.48 billion people worldwide in 2021 (eMarketer, 2019). Being a MIM application, Telegram can serve as an interesting tool that can gain users' interest easily and can be manipulated further as an effective educational tool.

Unlike most of the E-learning portals provided by higher learning institutions that are not available in the form of mobile applications, the availability of Telegram in the form of both mobile and desktop applications has made the application more convenient to be accessed by the users. In contrast to other social media like Facebook, Instagram and Twitter, MIM applications such as Telegram are more straightforward and offer fewer distractions to the users. Students' attention may not easily deviate during the learning period.

INNOVATION

Repurposing Telegram as a platform for conducting online quizzes in a simple, user-friendly and interactive way.

DESCRIPTION OF APPROACH

The initiative was exemplified in the Scientific Communication course that was taken by 29 students of the Resource Biotechnology programme at UNIMAS in Semester 2 2019/2020. A Telegram channel, Biotech Communicators, was created by the instructor, and it was subscribed by the students. Quizzes in the format of multiple-choice questions (MCQ) were created using the poll feature in the Telegram channel. Following each quiz, feedback was given by the instructor in order to facilitate students' understanding of the related topics. After the completion of the course, a survey was conducted using Google Form in order to gain feedback from

the students on the efficacy of the use of Telegram throughout the course. Figure 3.1 shows the percentage of students' participation in quizzes on Telegram during the course.

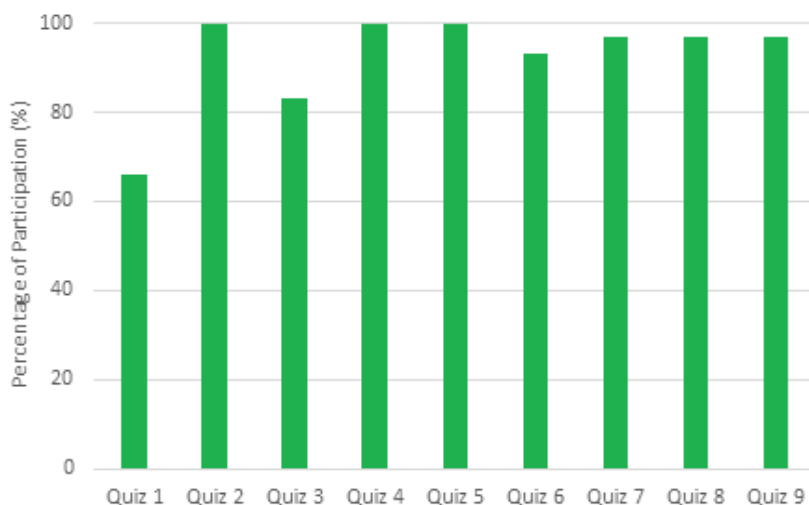


Figure 3.1: Percentage of students' participation in quizzes on Telegram during the course

The initiative of using Telegram as a supplementary teaching aid for Science Communication was found to result in favourable outcomes, which were measured in terms of students' performance and feedback. The use of Telegram for posting quizzes, which served as a revision platform for the students, contributed to the excellent achievement of all the course learning outcomes (93 – 100%). The passing rate of the final exam, which was conducted in the same format as the quizzes, namely MCQ, was 93%. This outcome is in line with the model suggested by Ansari and Khan (2020) that states the positive association of students' academic performance and students' engagement, where the latter can result from the interactivity of students with peers and teachers through the use of social media for knowledge sharing.

Based on the survey conducted, 90.9% of the respondents agreed that the use of Telegram as a platform for online quizzes during the course was beneficial. Whilst more than half of the respondents agreed that the use of Telegram has made remote T & L flexible and attractive, 91.3% of the respondents agreed that the use of Telegram during the course had sparked an interest in them to learn more and better in the future. The highest voted reason for why Telegram was preferred as a platform for quizzes is its ease of access. Further details on the feedback from the survey are presented in Figure 3.2.

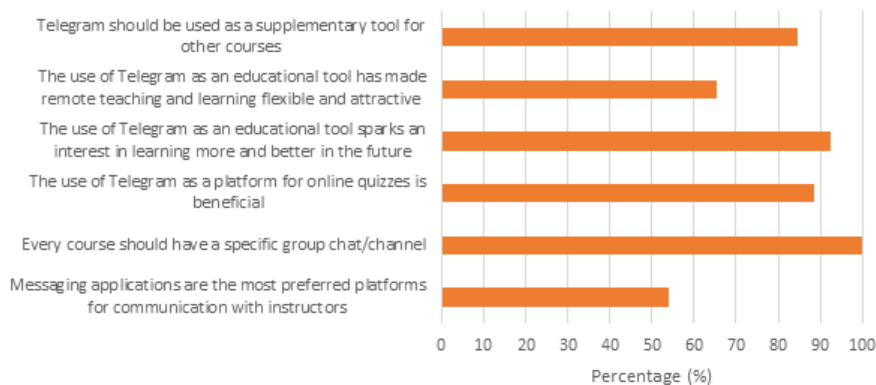


Figure 3.2: Perception of the surveyed students on the use of Telegram as a supplementary tool for Science Communication course at Faculty of Resource Science and Technology, UNIMAS

The anonymity of the quizzes conducted on Telegram due to the limited feature of the poll, which is initially created to generate random polls, is believed to have indirect positive implications on the attitude of the learners. As illustrated in Figure 3.1, high students' participation was shown where eight out of nine quizzes recorded at least 83% participation. This is in parallel with what has been reported by Jones (2019), where the anonymity of the assessments was found to encourage students'

participation. Moreover, seventy percent of respondents agreed that quizzes on Telegram were joyful, and they were able to attempt at their convenience. This is because the anonymity of the assessment may reduce the anxiety or sense of embarrassment amongst the students (Florenthal et al., 2019; Sheng et al., 2019).

There are some worthy suggestions given by the respondents that can be considered by Telegram for better functionality, particularly for remote teaching and learning. These include the inclusion of features that enable short-answer questions and flexibility in changing answers. To sum, the positive feedback showed by the students clearly showed their acceptance of the use of Telegram as a teaching aid in remote T & L.

In conclusion, the initiative presented has given useful insights into the promising role of Telegram as an effective tool for supporting mobile T & L. The insights will also be useful for the development and improvement of any messaging applications for better functionality in the future. This initiative demonstrated that mobile T & L could be made easy and flexible without the need for expensive applications and high data consumption. Although the initiative was demonstrated within the context of a science course, the potential of Telegram as a supplementary online T & L tool can be further extended to other courses, including non-science courses.

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