E-Labinar
An Asynchronous Online Lab Training

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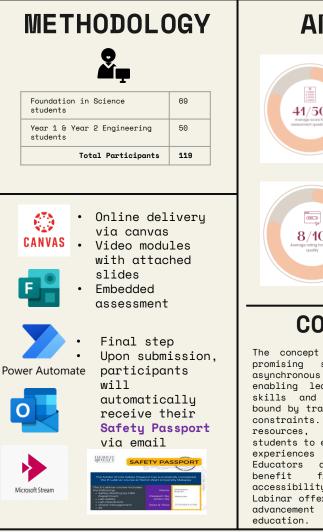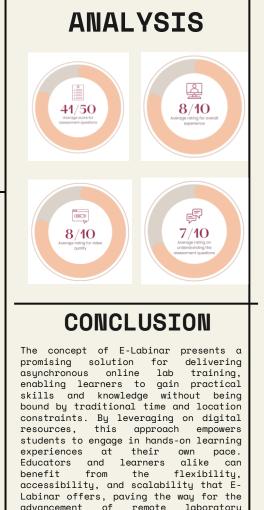**Heriot-Watt University Malaysia**

INTRODUCTION

The delivery of Labinar, which was an instructor-led and on-campus laboratory training module for lab-based courses, in Heriot-Watt University (HWU) Malaysia has been redesigned to suit remote learning. After 1 year of E-Labinar's implementation, it has enabled lab users 24-hour access to learning the module and at the same time earn a 'safety passport' which is a credential that proofs competencies in the pre-requisites before using the lab spaces. In this poster presentation, we will present how we aim to integrate assessments for learning and other tools so that E-Labinar is fit-for-purpose, and flexible to change.

METHODOLOGY

Foundation in Science students	69
Year 1 & Year 2 Engineering students	50
Total Participants	**119**

CANVAS
- Online delivery via canvas
- Video modules with attached slides
- Embedded assessment

Power Automate
- Final step
- Upon submission, participants will automatically receive their **Safety Passport** via email

Microsoft Stream

ANALYSIS

CONCLUSION

The concept of E-Labinar presents a promising solution for delivering asynchronous online lab training, enabling learners to gain practical skills and knowledge without being bound by traditional time and location constraints. By leveraging on digital resources, this approach empowers students to engage in hands-on learning experiences at their own pace. Educators and learners alike can benefit from the flexibility, accessibility, and scalability that E-Labinar offers, paving the way for the advancement of remote laboratory education.

RECOMMENDATIONS

Future application of E-Labinar will look at transforming the training module into a more advanced university-wide platform. Collaboration with the Health & Safety department plays an important role in the implementation of this course with improved user interface and tracking system.

REFERENCES

- Ahmed Omer Ahmed Ismail, Ahmad Kamil Mahmood, and Ammar Elyas Babiker (2013). Computer Labs: Training Undergraduate Students on An online lab by using Asynchronous Discussion Forum as An online learning Tool. International Journal of Scientific & Engineering Research, Volume 4, Issue 11, November-2013 1109 ISSN 2229-5518.
- Laurel M. Garrick Duhaney and Devon C. Duhaney, 2000. Assistive Technology: Meeting the Needs of Learners with Disabilities, International Journal of Instructional Media (vol. 27, issue 4).
- Patrick Buckley and Elaine Doyle, 2016. Gamification and student motivation, Interactive Learning Environments, 24:6, 1162-1175, DOI: 10.1080/10494820.2014.964263
- Zhang, D., Zhao, J., Zhou, L., & Numamaker, J. (2004). Can E-Learning Replace Classroom Learning? Communication of the ACM, 47(5), 75-78.