



Singapore Healthcare  
Management **2019**

# Asynchronous Learning Support: Developing Interactive E-Learning Modules for Family Medicine Learners

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## Introduction

- Family Medicine (FM) residents rotate to various hospital departments for broad based exposure, and this occurs at different periods throughout the academic year.
- An e-learning platform would allow asynchronous learning on the various topics at a time appropriate for the learner.
- FM ACP (Academic Clinical Programme) successfully obtained a grant for this project.

## Aim

To create asynchronous learning resources that are relevant for FM learners and accessible in a timely manner.

## Methodology

Feb 2018

- Formed **WORKGROUP** comprising FM core faculty



Mar 2018

- Selected **52** suitable FM core topics for development
- Identified first **6 TOPICS** to work on

Apr 2018

- Invited Office of SingHealth Academy (OSHA) to share **GUIDELINES** on designing e-modules
- Updated **STATUS** on the 6 topics

May 2018  
onwards

- PREPARATION** of flow and content of shortlisted topics by faculty members and OSHA
- CONVERTING** into e-modules using *Articulate*, an e-module authoring software
- UPLOADING** to FM Residency learning management system for workgroup's **REVIEW** and **FEEDBACK**
- e-Modules **SIGNED OFF** as completed after review

Jan 2019

- Updated **STATUS** on the 6 topics
- Chose remaining **24 TOPICS** for development

## Results

### eModule Development Status

- |  |  |
|--|--|
| ● Chronic Hepatitis B                                | <input checked="" type="checkbox"/> Oct 2018 |
| ● Abnormal Uterine Bleeding                          | <input checked="" type="checkbox"/> Feb 2019 |
| ● Basic Infection Control and Incontinence           | <input checked="" type="checkbox"/> May 2019 |
| ● Conclude development of the remaining 26 e-modules | <input type="checkbox"/> By Sep 2020         |

Feedback will be collected upon rollout of e-modules to learners, and this information to be fed-forward improve subsequent e-modules to be developed.

### Lessons learnt



Development of e-Modules requires familiarity with:

- Capabilities and limitations of the authoring software
- Learner engagement strategies, including types of learner interaction



Challenges encountered in e-module development include:

- Limitations in capability of *Articulate* e.g. lack of adaptive display for different devices, requirement for Flash capability of user devices, etc.
- Limited time and manpower
  - Workgroup members held multiple portfolios with other competing responsibilities
  - Timeline for e-module development was dependent on schedule of assigned media developer, who was concurrently handling other projects

## Conclusion



Good initiative to

- Support FM learners during their training in a timely manner
- Promote self-directed learning



Incorporate learning from initial e-module development process into subsequent training for content developers