UNIVERSITI TEKNOLOGI MARA

MAE514: Mathematical Software In Education

Course Name (English)	Mathematical Software In Education APPROVED
Course Code	MAE514

MQF Credit	3

Course Description	This course is designed to interpret students' understanding of mathematical concepts by applying some mathematical software. Students are expected to solve computational problems using technology such as Geogebra / other mathematical software. Emphasis will be given on how to use mathematical software in teaching mathematics. In addition, students also will explore the usage of other mathematics tools such as scientific calculators, google sheets, and excel in explaining mathematical concepts.

Transferable Skills	Information Technology,Personal Development

Teaching Methodologies	Lectures, Tutorial, Work-based Learning

CLO	CLO1 Interpret Mathematical concepts in Calculus, Algebra, and Geometry by applying mathematical software.
	CLO2 Apply mathematical tools/ software such as scientific calculator, graphic calculator, geometry, excel, google sheet in solving mathematical problems.
	CLO3 Construct program and lesson using mathematical software and/or tools to solve mathematical problem.

Pre-Requisite Courses	No course recommendations

Reading List	**Recommended Text**	• **Barbara E. Reynolds,William E. Fenton 2021, *College Geometry with GeoGebra*, 1 Ed., John Wiley & Sons [ISBN: 1119718112]**
		• **Masha Cromwell, *Google Apps and G-suite*, Masha Cromwell [ISBN: 1801885931]**
	Reference Book Resources	• **Joseph Schmuller 2022, *Statistical Analysis with Excel For Dummies*, For Dummies [ISBN: 1119844541]**
Article/Paper List	This Course does not have any article/paper resources	
Other References	This Course does not have any other resources	