

# **MODULE SPECIFICATION**

Part 1: Information							
Module Title	Project Management						
Module Code	UFMFHA-15-2		Level	Level 5			
For implementation from	2019-20						
UWE Credit Rating	15		ECTS Credit Rating	7.5			
Faculty	Faculty of Environment & Technology		Field	Engineering, Design and Mathematics			
Department	FET [	FET Dept of Engin Design & Mathematics					
Module type:	Project						
Pre-requisites		None					
Excluded Combinations		None					
Co- requisites		None					
Module Entry requirements		None					

# Part 2: Description

Educational Aims: See Learning Outcomes.

Outline Syllabus: The module comprises the following:

Projects and project management in an industrial context; portfolios and programmes. Including understanding the need for a high level of professional and ethical conduct in engineering projects.

Project organisation, structures, team building and human factors. Management and Leadership in projects.

Stakeholders, strategy and successful projects - understanding customer and user needs, managing strategic choices, identifying constraints including environmental and sustainability limitations.

Project planning, deconstructing a project through work-breakdown structures, task estimation, tools to manage constraints and achieve engineering objectives in project management (precedence relationships and critical path analysis).

Managing complexity: introduction to systems engineering.

Managing risk: through FMEA, Cause and effect, Fault trees, Delphi methods.

Project scheduling techniques to manage the design process: Network analysis, PERT, Critical path analysis, CPM.

Product pricing and project costing.

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Project control techniques: Cost and schedule control, identification and management of cost drivers.

Project Management strategies in an organisational context, protecting your ideas and IP. Project delivery, completion and appraisal.

**Teaching and Learning Methods:** Overview: Large group lecture supported by tutorial group sessions. The tutorial sessions are designed to encourage the student to pragmatically develop their domain specific competences whilst simultaneously developing professional managerial and project management skills, under tutor guidance. Study time outside of contact hours will be spent working on the group project exercise.

Scheduled learning: Students receive guidance on team dynamics and form teams. The projects proceed in parallel with lectures, to guide student centred learning. Students will be required to operate within a set of guidelines which will mandate a professional standard of record keeping at the individual and team level. Teams will receive guidance and support during their team meetings held during the 2hr tutorials.

Independent learning: Much of the project work will be undertaken outside the supported sessions.

## Part 3: Assessment

The assessment is a group activity, where the students work in a team to manage an engineering project. The assessment is structured to provide regular formative feedback to students groups on their progress in the structured tutorial sessions. A peer assessment process allows students to assess the contribution of fellow group members to the team activity. The result of the peer assessment is to produce individualised marks from the group report. The importance of the weekly monitoring is to emphasise the nature of project management as a team activity where team members are dependent on each other for the success of the task.

The online test assesses understanding of underlying project management principles and concepts based on an internationally recognised project management framework. These concepts are then applied to a project management group case study.

### Resit Strategy:

All students will have to redo the online project management test. For students who have been engaged, the resit assessment will be individual work based on a reworking of the case study carried out in the first sit. Students who have not engaged and/or not attended will have to do a new task that meets the learning outcomes.

First Sit Components	Final Assessment	Element weighting	Description
Report - Component A	✓	80 %	Group project report (4000 words)
In-class test - Component A		20 %	Online project management test
Resit Components	Final Assessment	Element weighting	Description
Report - Component A	<b>✓</b>	80 %	Individual project report (2500 words)
In-class test - Component A		20 %	Online project management test

Part 4: Teaching and Learning Methods							
Learning Outcomes	On successful completion of this module students will achieve the following learning outcomes:						
	Module Learning Outcomes						
	Show a detailed knowledge and understanding of formal project management techniques for the management of an engineering project						
	Demonstrate subject specific skills with respect to eliciting stakeholder requirements and developing into a working brief, resolving technical problems and delivering realistic outcomes  Demonstrate the ability to understand and respond appropriately to the issues associated with managing complex projects  Show cognitive skills with respect to eliciting, synthesizing and evaluating technical, commercial and economic data from multiple sources  Demonstrate key transferable skills in problem formulation, decision making, time management and communication						
Contact Hours	Independent Study Hours:						
	Independent study/self-guided study	6					
	Total Independent Study Hours:	6					
	Scheduled Learning and Teaching Hours:						
	Face-to-face learning	L4					
	Total Scheduled Learning and Teaching Hours:	14					
	Hours to be allocated	50					
	Allocated Hours	50					
Reading List	The reading list for this module can be accessed via the following link:  https://uwe.rl.talis.com/modules/ufmfha-15-2.html		<u> </u>				

### Part 5: Contributes Towards

This module contributes towards the following programmes of study:

Electronic Engineering [Sep][SW][Frenchay][5yrs] MEng 2018-19

Electrical and Electronic Engineering [Sep][SW][Northshore][5yrs] MEng 2018-19

Electronic and Computer Engineering [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Aerospace Engineering (Design) [Sep][FT][Frenchay][4yrs] MEng 2018-19

Aerospace Engineering with Pilot Studies [Sep][SW][Frenchay][5yrs] MEng 2018-19

Aerospace Engineering [Sep][SW][Frenchay][5yrs] MEng 2018-19

Mechanical Engineering [Sep][SW][Frenchay][5yrs] MEng 2018-19

Automotive Engineering [Sep][SW][Frenchay][5yrs] MEng 2018-19

Aerospace Engineering [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Aerospace Engineering with Pilot Studies [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Electrical and Electronic Engineering [Sep][SW][Frenchay][5yrs] MEng 2018-19

Mechanical Engineering [Sep][FT][Frenchay][4yrs] MEng 2018-19

Mechanical Engineering [Sep][FT][Frenchay][3yrs] BEng 2018-19

Mechanical Engineering [Sep][SW][Frenchay][4yrs] BEng 2018-19

Aerospace Engineering (Design) [Sep][SW][Frenchay][5yrs] MEng 2018-19

Aerospace Engineering (Systems) [Sep][FT][Frenchay][4yrs] MEng 2018-19

Aerospace Engineering with Pilot Studies [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Aerospace Engineering with Pilot Studies (Design) [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Aerospace Engineering with Pilot Studies (Design) [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Aerospace Engineering with Pilot Studies [Sep][FT][Frenchay][4yrs] MEng 2018-19

Aerospace Engineering with Pilot Studies (Design) [Sep][SW][Frenchay][5yrs] MEng 2018-19

Automotive Engineering [Sep][FT][Frenchay][4yrs] MEng 2018-19

Automotive Engineering [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Automotive Engineering [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Aerospace Engineering with Pilot Studies (Manufacturing) [Sep][SW][Frenchay][5yrs] MEng 2018-19

Aerospace Engineering with Pilot Studies (Systems) [Sep][SW][Frenchay][5yrs] MEng 2018-19

Aerospace Engineering with Pilot Studies (Systems) [Sep][FT][Frenchay][4yrs] MEng 2018-19

Aerospace Engineering with Pilot Studies (Manufacturing) [Sep][FT][Frenchay][4yrs] MEng 2018-19

Aerospace Engineering with Pilot Studies (Design) [Sep][FT][Frenchay][4yrs] MEng 2018-19

Aerospace Engineering with Pilot Studies (Manufacturing) [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Aerospace Engineering with Pilot Studies (Systems) [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Aerospace Engineering with Pilot Studies (Manufacturing) [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Aerospace Engineering with Pilot Studies (Systems) [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Electronic and Computer Engineering [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Electronic and Computer Engineering {Top Up} [Aug][FT][SHAPE][1yr] BEng (Hons) 2018-19

Electronic and Computer Engineering {Top Up} [Aug][PT][SHAPE][2yrs] BEng (Hons) 2018-19

Electronic and Computer Engineering [Sep][PT][GlosColl][5yrs] BEng (Hons) 2018-19

Electronic and Computer Engineering {Apprenticeship} [Sep][PT][GlosColl][5yrs] BEng (Hons) 2018-19

Aerospace Engineering (Manufacturing) [Sep][FT][Frenchay][4yrs] MEng 2018-19

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Aerospace Engineering [Sep][FT][Frenchay][4yrs] MEng 2018-19

Aerospace Engineering (Manufacturing) [Sep][SW][Frenchay][5yrs] MEng 2018-19

Aerospace Engineering (Systems) [Sep][SW][Frenchay][5yrs] MEng 2018-19

Aerospace Engineering [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Aerospace Engineering (Design) [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Aerospace Engineering (Design) [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Aerospace Engineering (Manufacturing) [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Aerospace Engineering (Manufacturing) [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Aerospace Engineering (Systems) [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Aerospace Engineering (Systems) [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Aerospace Engineering (Systems) {Foundation} [Sep][SW][Frenchay][5yrs] BEng (Hons) 2018-19

Electronic Engineering [Sep][FT][Frenchay][4yrs] MEng 2018-19

Electronic Engineering [Sep][FT][Frenchay][3yrs] BEng (Hons) 2018-19

Electronic Engineering [Sep][SW][Frenchay][4yrs] BEng (Hons) 2018-19

Aerospace Engineering with Pilot Studies (Foundation) [Sep][SW][Frenchay][5yrs] BEng (Hons) 2018-19

Aerospace Engineering (Foundation) [Sep][SW][Frenchay][5yrs] BEng (Hons) 2018-19