STUDENT AND ACADEMIC SERVICES

MODULE SPECIFICATION

Part 1: Information			
Module Title	Advanced Facades		
Module Code	UBLMJP-15-M	Level	Level 7
For implementation from	2019-20		
UWE Credit Rating	15	ECTS Credit Rating	7.5
Faculty	Faculty of Environment & Technology	Field	Architecture and the Built Environment
Department	FET Dept of Architecture & Built Environ		
Module type:	Standard		
Pre-requisites	None		
Excluded Combinations	None		
Co- requisites	None		
Module Entry requirements	None		

Part 2: Description

Overview: Pre-requisites: PT students are strongly recommended to take this module as the last of the eight 15 credit modules.

Educational Aims: This unit looks at several areas of development and technology that are likely to play an ever increasing role in future façade design.

Outline Syllabus: The use of natural ventilation in new buildings is increasing as we look for ways to reduce energy use. In order to provide comfortable conditions and meet the need of occupants, the use of automated Façades are becoming more common. How this is achieved? How are automated Façades specified, installed and commissioned? What functions can they provide? How are they controlled? Do we incorporate and integrate automated shading devices? What role can double Façades play?

Since July 2016, BIM level 2 has been required for all government funding building in the UK. What does this mean for the façade? What information is required? By who, and when? What level of detail? Who owns the information and how is it updated?

Fire performance of Façades is an area of great interest, especially after numerous recent large-scale fires in the Middle East. This unit will discuss the principles of fire spread and how they relate to the façade. Fire testing and the regulatory requirements will be discussed.

The final section on interfaces and practical details will look at how the different performance characteristics discussed during the course can all be satisfied.

Teaching and Learning Methods: The module is delivered by way of five study days for face to face teaching.

The module will be delivered by means of a series of lectures, seminars and tutorials.

Lectures and seminars will be used to enable students to support their own independent learning by exploring deeper issues pertaining to Façade Engineering and receiving formative feedback. Occasional speakers will be used to provide up to date material and context to the applications of the subject area.

A series of tutorials are designed to provide knowledge and practical skills relevant to façade engineering.

Directed reading examining the key principles and relevant criteria relating to a number of topics of importance to façade Engineering.

Part 3: Assessment

Component A will be assessed via a Video Presentation on a real world practical activity which a professional Façade Engineer would need to undertake on Automated Facades.

Component B is assessed via an Essay which supports assimilation and reflection of taught material, with literature and application to real world examples on a Risk assessments related to Advanced Facades such as Fire.

Resit strategy will consist on working through a similar form of assessment, so that the students can improve according to the feedback received.

First Sit Components	Final Assessment	Element weighting	Description
Written Assignment - Component B	✓	50 %	Risk Assessment Essay (1,500 words)
Presentation - Component A		50 %	Video Presentation on Automated Façades (7-10 mins)
Resit Components	Final Assessment	Element weighting	Description
Written Assignment - Component B	✓	50 %	Risk Assessment Essay (1,500 words)
Presentation - Component A		50 %	Video Presentation on Automated Façades (7-10 mins)

Part 4: Teaching and Learning Methods	
Learning Outcomes	On successful completion of this module students will achieve the following learning outcomes:

Module Learning Outcomes	Reference
Critically analyse the design, specification and control of automated façade systems	MO1
Calculate the effectiveness of shading devices	MO2
Critically evaluate the Façade in a BIM environment	MO3
Assess the risk of fire spread in a façade system	MO4

Contact Hours	Independent Study Hours:	
	Independent study/self-guided study	118
	Total Independent Study Hours:	118
	Scheduled Learning and Teaching Hours:	
	Face-to-face learning	32
	Total Scheduled Learning and Teaching Hours:	32
	Hours to be allocated	150
	Allocated Hours	150

Reading List	*The reading list for this module can be accessed via the following link:* https://uwe.rl.talis.com/modules/ublmjp-15-m.html

Part 5: Contributes Towards

This module contributes towards the following programmes of study: