Module Descriptor

Title	3D Modelling		
Session	2025/26	**Status**	Active
Code	COMP08013	**SCQF Level**	8
Credit Points	20	**ECTS (European Credit Transfer Scheme)**	10
School	**Please select**		
Module Co-ordinator	John McQuillan		

Summary of Module

This module develops 3D skills in modelling and UV unwrapping, focussing on hard surface modelling in the first half, and moving on to organic modelling in the second. Students will also develop an appreciation of the need for good topology and the relationship between topology and UV mapping for texturing.

 This module embeds the key "I am UWS" graduate attributes and in particular: Academic Universal

Analytical Inquiring Work Ready Knowledgeable Digitally Literate Problem-solver Successful Autonomous

Incisive Innovative Personal Universal Ethically-minded Work Ready Motivated Successful Creative

Imaginative Resilient Professional Universal Collaborative Research-minded

Module Delivery Method	On-Campus[1] ☒	Hybrid[2] ☐	Online[3] ☐	Work -Based Learning[4] ☐
Campuses for Module Delivery	☐ Ayr ☐ Dumfries	☐ Lanarkshire ☐ London ☒ Paisley	☐ Online / Distance Learning ☐ Other (specify)	

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[1] Where contact hours are synchronous/ live and take place fully on campus. Campus-based learning is focused on providing an interactive learning experience supported by a range of digitally-enabled asynchronous learning opportunities including learning materials, resources, and opportunities provided via the virtual learning environment. On-campus contact hours will be clearly articulated to students.

[2] The module includes a combination of synchronous/ live on-campus and online learning events. These will be supported by a range of digitally-enabled asynchronous learning opportunities including learning materials, resources, and opportunities provided via the virtual learning environment. On-campus and online contact hours will be clearly articulated to students.

[3] Where all learning is solely delivered by web-based or internet-based technologies and the participants can engage in all learning activities through these means. All required contact hours will be clearly articulated to students.

[4] Learning activities where the main location for the learning experience is in the workplace. All required contact hours, whether online or on campus, will be clearly articulated to students

Terms for Module Delivery	Term 1	☒	Term 2	☐	Term 3	☐
Long-thin Delivery over more than one Term	Term 1 – Term 2	☐	Term 2 – Term 3	☐	Term 3 – Term 1	☐

Learning Outcomes	
L1	Demonstrate an understanding of the underlying principles and terminology of 3D polygonal modelling.
L2	Create 3D polygonal models, demonstrating an ability to create coherent topology and UV layout
L3	Demonstrate an understanding of the relationship between topology and the final requirements of a model for texturing and/or animation
L4	
L5	

Employability Skills and Personal Development Planning (PDP) Skills	
SCQF Headings	During completion of this module, there will be an opportunity to achieve core skills in:
Knowledge and Understanding (K and U)	SCQF 8 Students will develop core skills in modelling required for employment in the 3D animation/games industry. Students will develop an understanding of the theory around flow of polygons (topology) in models and how this affects shape and function, as well as the theory underpinning UV mapping.
Practice: Applied Knowledge and Understanding	SCQF 8 Students will apply the techniques discussed in lectures and lab sessions to their own modelling and solve problems in modelling for animation, Students will work with a variety of software for 3D modelling and image manipulation
Generic Cognitive skills	SCQF 8 Students will identify and solve routine problems in 3D modelling, and UV unwrapping. Problems will include developing solutions in lighting and shot framing, as well as solutions to mechanical animation problems, identifying appropriate tools and using scripting to automate animation.
Communication, ICT and Numeracy Skills	SCQF 8 Students will develop the numeric skills necessary to implement manipulation of polygonal mesh in 3D within a dedicated 3D application.
Autonomy, Accountability and Working with Others	SCQF 8 Students will engage in individual project work and in a semi-autonomous final group project. In the group project students will develop skills in managing assets required across a project by different team members.

Prerequisites	Module Code COMP07010	Module Title Introduction to Computer Animation
	Other Equivalent to above for direct entry	
Co-requisites	Module Code	Module Title

Learning and Teaching

In line with current learning and teaching principles, a 20-credit module includes 200 learning hours, normally including a minimum of 36 contact hours and maximum of 48 contact hours.

Much use is made of video tutorial material, mostly produced 'in house', although students are directed to external online resources where suitable material exists. All assessment is practical with reflective documentation.

Learning Activities During completion of this module, the learning activities undertaken to achieve the module learning outcomes are stated below:	Student Learning Hours (Note: Learning hours include both contact hours and hours spent on other learning activities)
Lecture / Core Content Delivery	12
Laboratory / Practical Demonstration / Workshop	36
Asynchronous Class Activity	40
Independent Study	112
Please select	
Please select	
TOTAL	200

Indicative Resources

The following materials form essential underpinning for the module content and ultimately for the learning outcomes:

Course notes and indicated online material.

(N.B. Although reading lists should include current publications, students are advised (particularly for material marked with an asterisk*) to wait until the start of session for confirmation of the most up-to-date material)

Attendance and Engagement Requirements

In line with the Student Attendance and Engagement Procedure, Students are academically engaged if they are regularly attending and participating in timetabled on-campus and online teaching sessions, asynchronous online learning activities, course-related learning resources, and complete assessments and submit these on time.

For the purposes of this module, academic engagement equates to the following:

Attendance at all scheduled classes unless with reason for non-attendance. Submission of all coursework including non-graded class exercises. Clear and timely communication with reasons for non-attendance or non-submission of/late coursework. Other areas of measure may also be used, including degree of access to University based online teaching resources. Students should note that the University has a minimum 80% attendance requirement in all

modules. If you fall below this, you will be referred to the Student Success Team to see how we can best support your studies.	

Equality and Diversity
The University's Equality, Diversity and Human Rights Procedure can be accessed at the following link: UWS Equality, Diversity and Human Rights Code. Aligned with the University's commitment to equality and diversity, this module supports equality of opportunity for students from all backgrounds and learning needs. Using the VLE, material will be presented electronically in formats that allow flexible access and manipulation of content. This module complies with University regulations and guidance on inclusive learning and teaching practice. This module has lab-based teaching and as such you are advised to speak to the Module Co-ordinator to ensure that specialist assistive equipment, support provision and adjustment to assessment practice can be put in place, in accordance with the University's policies and regulations.
(N.B. Every effort will be made by the University to accommodate any equality and diversity issues brought to the attention of the School)

Supplemental Information

Divisional Programme Board	Computing
Overall Assessment Results	☐ **Pass / Fail** ☒ **Graded**
Module Eligible for Compensation	☒ Yes ☐ No **If this module is eligible for compensation, there may be cases where compensation is not permitted due to programme accreditation requirements. Please check the associated programme specification for details.**
School Assessment Board	Creative Computing
Moderator	Mark Carey
External Examiner	S Kennedy Parr
Accreditation Details	Screen Skills
Module Appears in CPD catalogue	☐ Yes ☒ No
Changes / Version Number	2.11

Assessment (also refer to Assessment Outcomes Grids below)
Assessment 1
Practical: consisting of two submissions of portfolio work (3D renders and models, hard surface and organic). Written: short reflective document dealing with what the student sees as the areas they need to improve on based on both submissions (submitted with the second assessment as part of the overall portfolio of work).
Assessment 2
Assessment 3
(N.B. (i) Assessment Outcomes Grids for the module (one for each component) can be found below which clearly demonstrate how the learning outcomes of the module will be assessed.

> (ii) An indicative schedule listing approximate times within the academic calendar when assessment is likely to feature will be provided within the Student Module Handbook.)

Component 1

Assessment Type	LO1	LO2	LO3	LO4	LO5	Weighting of Assessment Element (%)	Timetabled Contact Hours
Portfolio of Practical work	☒	☒	☒	☐	☐		

Component 2

Assessment Type	LO1	LO2	LO3	LO4	LO5	Weighting of Assessment Element (%)	Timetabled Contact Hours
	☐	☐	☐	☐	☐		

Component 3

Assessment Type	LO1	LO2	LO3	LO4	LO5	Weighting of Assessment Element (%)	Timetabled Contact Hours
	☐	☐	☐	☐	☐		
Combined total for all components						100%	hours

Change Control

What	When	Who
Minor changes to wording to fit with new format descriptor	28/02/2025	John McQuillan
Module title change from "3D Asset Production 1" to "3D Modelling"	28/02/2025	John McQuillan