Module Descriptor

Title	Blockchain Technologies for Finance		
Session	2025/26	**Status**	
Code	COMP11106	**SCQF Level**	11
Credit Points	20	**ECTS (European Credit Transfer Scheme)**	10
School	**Computing, Engineering and Physical Sciences**		
Module Co-ordinator	Martins Olaleye		

Summary of Module

The module aims to introduce students to the current developments in FinTech and its impact on investors, the financial services industry, markets and the global economy. It explores the on going developments, issues, and debates and pinpoints the importance of FinTech and related concepts for different stakeholders. At the successful completion of this module students should be able to understand and critically evaluate issues on FinTech, Blockchain and related concepts and link their understanding with the recent developments in the global digital economy in general, and the financial services industry, in particular.

Outline Syllabus: Introduction to FinTech and its roles in the digital economy; Digital Identity and Cloud Computing;Data Science and Big Data Analytics, Blockchain and Distributed Ledger Technology; Cryptoassets; Open Banking: Digital Payments Systems; Disruption in Asset Servicing and Capital Markets; Disruption in Investment Management and alternative Data in Portfolio Management; Online Marketplace Lending and Crowdfunding; WealthTech, RegTech and InsurTech; The Impact and legal implications of FinTech.

This module will work to develop a number of the key 'I am UWS' Graduate Attributes to make those who complete this module.

Universal: critical thinker; ethically-minded; and research-minded

Work Ready: problem-solver; effective communicator; and ambitious

Successful: autonomous; resilient; and driven

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)	

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 about current developments in FinTech and its impact on investors, the financial services industry, markets and the global economy.
L2	Explore contemporary issues in cloud computing, blockchain, cryptoassets, and other related subjects in the financial services industry.
L3	Understand the real nature of digital payment systems and the role of FinTech in the disruption in asset servicing and capital markets.
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 11** Knowledge & understanding of working principle of Blockchain Technologies for Finance.
Practice: Applied Knowledge and Understanding	**SCQF 11** Knowledge of practical skills to apply basic theoretical concepts to design and implementation of Blockchain Technologies for Finance.
Generic Cognitive skills	**SCQF 11** Students will develop ability to critically examine and appreciate the central issues in the main sub-areas of Blockchain Technologies for Finance.

[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

Communication, ICT and Numeracy Skills	**SCQF 11** Compiling individual report students will develop communication skills as well as the ability to write technical report.
Autonomy, Accountability and Working with Others	**SCQF 11** Students will be encouraged to work with others in tutorials and lab sessions for finding information and solving problems on the assigned task. In doing so, students will develop a sense of accountability to the other members.

Prerequisites	**Module Code**	**Module Title**
	Other	
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. This module is delivered using a combination of formal interactive lectures and worskshops Workshops will be used to reinforce the taught component and formative assessments will allow for monitoring progress.	
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	24
Laboratory / Practical Demonstration / Workshop	24
Independent Study	152
Please select	
Please select	
Please select	
TOTAL	200

Indicative Resources
The following materials form essential underpinning for the module content and ultimately for the learning outcomes: Blockchain & Fintech: A Comprehensive Blueprint to Understanding Blockchain & Financial Technology - Richard Hayen* Financial Technology: FinTech, Blockchain, Smart Contracts - Jeff Reed* Blockchain Revolution: How the Technology Behind Bitcoin Is Changing Money, Business, and the World - Don Tapsco*

(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:** The School of Computing, Engineering and Physical Sciences considers attendance and engagement to mean a commitment to attending, and engaging in, timetabled sessions. You will scan your attendance via the scanners each time you are on-campus and you will login to the VLE several times per week. Where you are unable to attend a timetabled learning session due to illness or other circumstance, you should notify the Programme Leader that you cannot attend. Across the School an 80% attendance threshold is set. 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	**Please select**
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	Business & Applied

Moderator	Graeme A. McRobbie
External Examiner	TBC
Accreditation Details	
Module Appears in CPD catalogue	☐ **Yes** ☒ **No**
Changes / Version Number	1.0

Assessment (also refer to Assessment Outcomes Grids below)
Assessment 1
A class test under strict examination conditions. The class test is intended to assess the student's understanding of the principles underpinning the technologies and frameworks studied in the module. The class test is worth 50% of the overall mark.
Assessment 2
A portfolio of practical work demonstrating the practical application of blockchain technologies in producing a to a problem. The portfolio of practical work is worth 50% of the overall mark.
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**
Class test	☒	☐	☐	☐	☐	50	

Component 2							
Assessment Type	**LO1**	**LO2**	**LO3**	**LO4**	**LO5**	**Weighting of Assessment Element (%)**	**Timetabled Contact Hours**
Project report	☒	☒	☒	☐	☐	50	

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