Highlands University College Jersey

UNIVERSITY OF PLYMOUTH

PROGRAMME QUALITY HANDBOOK 2019 – 20

FdSc Information Technology for Business

Contents

1. Welcome and Introduction to FdSc Information Technology for Business

Welcome to the Foundation Degree (FdSc) in Information Technology for Business approved by the University of Plymouth. The college is delighted that you have chosen to study with us.

This programme has been designed to equip you with the skills and knowledge base required to work in your chosen specialism or other graduate opportunities. It is also a platform from which you can undertake additional vocational and academic qualifications.

This Programme Quality handbook contains important information including:

- The approved programme specification
- Module records

Note: The information in this handbook should be read in conjunction with the current edition of:

- Your Institution & University Student Handbook which contains student support-based information on issues such as finance and studying at HE
    - available at http://www.highlands.ac.uk/moodle
- University of Plymouth Student Handbook
    - available at: https://www.plymouth.ac.uk/your-university/governance/student-handbook

2. Programme Information

2.1 Programme Specification

The FdSc Information Technology for Business degree has been designed to provide an informative and challenging programme of study which develops a sound knowledge of computing and business, enabling students to develop IT solutions to business problems and to recognise how IT can support and enhance business operations. This 2-year full time/part time 3 year programme aims to prepare students for a business career in information technology, enabling them to use a range of computing, analytical and problem solving tools, to enable them to be effective and efficient members of their work teams. It will enhance lifelong learning skills and personal development to enable students to fully contribute to society at large.

The FdSc Information Technology for Business degree allows the opportunity to progress to the BSc (Hons) Computing at Plymouth University.

Awarding Institution:	University of Plymouth
Teaching Institution:	University College Jersey
Accrediting Body:	N/A
Final Award:	FdSc Information Technology for Business
Intermediate Awards:	Certificate of Higher Education (CertHE)
Programme Title:	Foundation Degree in Information Technology for Business
UCAS Code:	N/A
JACS Code	N/A
Benchmarks	Foundation Degree Qualification Benchmarks and informed by relevant sections of the QAA Computing benchmarks and QAA Subject Benchmark for General Business & Management
Date of Approval:	May 2017

2.2 Admissions Criteria

Awards Required for Entry to FdSc Year 1	Comments
Key Skills requirement/Higher Level Diploma	Normally level 2 skills achievements including literacy and numeracy
And/or GCSEs required at Grade C and above	5 at grade C or above or 4 including English and Maths
APEL/APCL possibilities, see [www.plymouth.ac.uk] and search using the term AP(E)L	Refer to the Highlands College and University regulations for APL. The APL process is lengthy, and applications should be made at least 6 months before the start of the programme
Interview/portfolio requirements	Although the College retains the right to interview all applicants; those who have previously taken a related Foundation Degree validated by University of Plymouth will not normally be required to attend an interview. The ideal candidate has a good record of achievement (in both academic and other spheres), determination and strong team working skills and has had some experience of working in the childcare sector.
A Levels required:	A minimum of 64 UCAS points or two A Levels or equivalent
BTEC National Certificate/Extended Diploma	Comparable grade profile in a BTEC subject, e.g. Information Technology for Business
Access to HE or Year 0 provision	Access to HE certificate
International Baccalaureate	A minimum of 26 points
Work Experience	By interview

Other non-standard awards or experiences	By interview
APEL/APCL possibilities home.plymouth.ac.uk/regulations	By interview (6 months before the programme is due to commence)

The college has in place a process for the admission and support of students who register a disability which may include an advisory interview and assessment. Mature students with non-standard qualifications are encouraged to apply, but should, in the first instance, contact the Programme Lead for a general discussion.

3. Programme Information

3.1 Programme aims and learning outcomes

Aims of the Programme
The programme is intended to: 1. Provide an informative and challenging programme of study which develops a sound knowledge of computing and business, enabling students to develop IT solutions to business problems and to recognise how IT can support and enhance business operations; 2. Prepare students for a business career in information technology, enabling them to use a range of computing, analytical and problem-solving tools, to be effective and efficient members of their work teams; 3. Enhance lifelong learning skills and personal development to enable students to fully contribute to society at large.
Programme Intended Learning Outcomes
By the end of this programme the student will be able to: 1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. They will also be able to demonstrate knowledge and understanding of business systems, accounting and financial reporting, and decision making; 2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance

with the basic theories and concepts of computing and business and recognising the impact of real world complexity;
3. Apply and evaluate a range of approaches to manipulating and representing information, and translating business problems into structured IT solutions;
4. Work as an effective member of staff, exercising personal responsibility, and undertaking additional education and training as part of their career development plan;
5. Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management;
6. Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions;
7. Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions;
8. Work as an effective member of team, effectively communicating information, arguments and analysis in a variety of forms to specialist and non-specialist audiences and applying the concepts and principles of business and computing in a work context and in a changing environment.

3.2 Brief Description of the Programme

The programme has been designed to develop graduates who will have the knowledge, skills and personal qualities required by IT professionals in Jersey. This means that it has a strong emphasis on the analysis of business needs and the design, implementation and operations of IT systems. It also reflects the fact that much IT work is outsourced in Jersey in three ways:

- By the Finance Industry to IT companies in Jersey and around the world
- To IT companies in Jersey from other parts of the world
- By IT companies to other IT companies (mainly for software development)

The programme therefore covers areas such as application selection, deployment and support, international supply chain management and customer/supplier relationship management.

3.3 Programme Structure and Pathways

The modules that make up the programme of both full-time and part-time study are listed below.

Full time programme – 2 years				
Module Code (Stage 1)	**Module Title**	**Level**	**Credits**	**Term**
HIGH1054	Professional Practice	4	20	1, 2, 3
HIGH1058	Fundamentals of Networks	4	20	1, 2, 3
HIGH1059	Software Development	4	20	1, 2, 3
HIGH1055	Business Information Systems	4	20	1, 2, 3
HIGH1051	Business Relationship and Customer Service Management	4	20	1, 2, 3
HIGH1035	IT Systems, Services, Software and Support	4	20	1, 2, 3
Total for Year 1		**4**	**120**	

Module Code (Stage 2)	**Module Title**	**Level**	**Credits**	**Term**
HIGH2068	Systems Analysis and Design	5	20	1, 2, 3
HIGH2034	IT Project Management	5	20	1, 2, 3
HIGH2070	Network Management	5	20	1, 2, 3
HIGH2069	Data Driven Applications	5	20	1, 2, 3
HIGH2067	Web Applications 1	5	20	1, 2, 3
Optional Modules (choose 1)				
HIGH2049	Wide Area Networks and Security	5	20	1, 2, 3
HIGH2050	Web Applications 2	5	20	1, 2, 3
Total for Year 2		**5**	**120**	

Part time programme – 3 years				
Module Code (Stage 1)	**Module Title**	**Level**	**Credits**	**Term**
HIGH1054	Professional Practice	4	20	1, 2, 3
HIGH1058	Fundamentals of Networks	4	20	1, 2, 3
HIGH1035	IT Systems, Services, Software and Support	4	20	1, 2, 3
HIGH1051	Business Relationship and Customer Service Management	4	20	1, 2, 3

Total for Year 1	**4**	**80**	

Module Code (Stage 1)	Module Title	Level	Credits	Term
HIGH1059	Software Development	4	20	1, 2, 3
HIGH1055	Business Information Systems	4	20	1, 2, 3
HIGH2070	Network Management	5	20	1, 2, 3
HIGH2067	Web Applications 1	5	20	1, 2, 3
Total for Year 2		**4&5**	**80**	

Module Code (Stage 2)	Module Title	Level	Credits	Term
HIGH2068	Systems Analysis and Design	5	20	1, 2, 3
HIGH2034	IT Project Management	5	20	1, 2, 3
HIGH2069	Data Driven Applications	5	20	1,2,3
Optional Modules (choose 1)				
HIGH2050	Web Applications 2 - optional	5	20	1, 2, 3
HIGH2049	Wide Area Networks and Security - optional	5	20	1, 2, 3
Total for Year 3		**5**	**80**	

3.4 Progression Routes

Successful graduates of this programme will be able to progress to Stage 3 of the BSc (Hons) Computing at the University of Plymouth.

3.5 Any Exceptions to Regulations

None.

4. Teaching Methods and Assessments

4.1 Distinctive Features of the Foundation Degree

Distinctive Features of the Foundation Degree
• Designed to meet the needs of the IT sector, with the active support of the IT sector in Jersey; • Significant work-based learning fully supported by the IT sector in Jersey; • Based upon the standards and syllabi of professional bodies; • Strong emphasis on the exploration of theory in the work context; • Rigorous approach to the development and assessment of job knowledge, skills and behaviour through work-based learning; • Progression opportunities to honours degree at the University of Plymouth; • Prepares graduates for a wide variety of career paths in the IT sector.

4.2 Explanation and Mapping of Learning Outcomes, Teaching & Learning and Assessment[1]

FHEQ level: 4					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
Knowledge and Understanding Covered by CB 3.3 ii - iv By the end of this level of this programme students will be able to demonstrate requisite understanding of the main body of knowledge of Information Technology for Business for a threshold pass: • Demonstrate understanding of the scientific method and its applications to problem solving in this area. • Demonstrate knowledge and understanding of essential facts, concepts, principles and theories relating to Computing and computer applications • Use such knowledge and understanding in the modelling and design of computer-	**Primary** • College lectures, workshops and tutorials • Directed independent study • In-house courses and coaching in the workplace • Learning from work experience **Secondary** • Case studies • Problem-solving exercises • Individual and group research	1	1, 2, 3, 5, 6, 7	Examination Practical labs Coursework	HIGH1058 HIGH1059 HIGH1035

[1] For programmes containing more than one FHEQ level of study, i.e. a bachelor programme with levels 4, 5 & 6, a separate map must be provided for each level. The table should be copied and pasted to enable this.

FHEQ level: 4					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
based systems for the purposes of comprehension and communication					
An explanation for embedding Knowledge and Understanding through Teaching & Learning and Assessment at this level of the programme: Knowledge and understanding are developed through, lectures, on-line learning, independent and group study, etc. and enhanced by guest speakers. Assessment is through a range of methods including course work, examination and practical labs					
Cognitive and Intellectual Skills: Covers CB 3.3v – 3.5vii and GMB 3.9 By the end of this level of this programme students will be able to understand and apply essential concepts, principles and practices in the context of well-defined scenarios for a threshold pass: • Recognise and analyse criteria and specifications appropriate to specific problems, and plan strategies for their solutions • Analyse the extent to which a computer-based system meets the criteria defined for its current use and future development.	**Primary** • Workshops, class exercises and simulations • Tutorial/seminar discussions • Feedback via coursework assessment process • Learning from work experience **Secondary** • For example: • Developing computer applications for business tasks • Coaching by workplace mentor	1, 2	2, 3, 5, 6, 7	Examination Practical labs Coursework	HIGH1058 HIGH1059 HIGH1035 HIGH1055

FHEQ level: 4					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
• Deploy appropriate theory, practices and tools for the specification, design, implementation and evaluation of computer-based systems • Recognise the professional, economic, moral and ethical issues involved in the sustainable exploitation of computer technology and be guided by the adoption of appropriate professional, ethical and legal practices (CB 3.3 viii)					
An explanation for embedding Cognitive and Intellectual Skills through Teaching & Learning and Assessment at this level of the programme: At this level students are supported in developing cognitive skills through in class exercises, including discussion and debate, through reviewing case studies and business practice and through problem-based learning. They reflect on the outcome of practical labs and programmes created. These skills are tested in in reports, practical labs to so extend via examination.					
Key Transferable Skills: Covers CB 3.5ii – 3.5iv and GMB 3.9 To meet a threshold pass at this level of the programme students will be able to demonstrate basic competency of generic study skills, and an ability to work under guidance as well as independently. This includes	**Primary** • Class and seminar interactions and feedback • Group work awareness and practice • Research exercises • Learning from work experience • Visiting Lectures	1, 2, 3	2, 4, 7, 8	Case studies Group work assessments Presentations Professional Development Plan	HIGH1054 HIGH1055 HIGH1051

FHEQ level: 4					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
• Demonstrating good literacy skills and the ability to construct well-argued and grammatically correct documents. • Demonstrating good numerical skills how qualitative and quantitative data can be processed and interpreted for business and computing purposes • Locating and retrieving relevant ideas, and ensure these are mostly correct and accurately referenced and attributed • Showing self-awareness of own limitations and the ability to reflect • Working unsupervised, plan effectively to meet deadlines and respond to challenges • Working independently and adapt to changing circumstances • Presenting rational arguments that address a given problem or opportunity, to a range of audiences (orally, electronically or in writing).	**Secondary** • Library and other research exercises • Work based learning mentor				
An explanation for embedding Key Transferable Skills through Teaching & Learning and Assessment at this level of the programme:					

FHEQ level: 4					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
Transferable skills are taught in a number of different ways across the programme and in different modules. These are strengthened through Work based learning WBL, feedback from organisation mentors, the company appraisal system and feedback from the WBL tutor. They are assessed in different ways in different modules including as part of the coursework including within a professional development plan.					
Employment Related Skills: Covered by CB 3.5 ii-vii To meet a threshold, pass at this level of the programme students will identify appropriate practices within a professional, legal and ethical framework. Students can identify the need for continuing professional development and work as a team member • Recognise and make best use of the skills and knowledge of individuals to collaborate. • Identify problems and desired outcomes and negotiate to mutually acceptable conclusions. • Demonstrate contextual awareness by understanding and meeting the needs of individuals and the business	• Lectures and tutorials • Learning from work experience • Coaching by Work Mentor • Group Projects	2	4, 8	Coursework Case studies Presentations Professional Development Plan	HIGH1054 HIGH1055 HIGH1051

FHEQ level: 4					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
• Demonstrate an understanding of how workplaces and organisations are governed • Working under supervised, plan effectively to meet deadlines and respond to challenges					
An explanation for embedding Employment Related Skills through Teaching & Learning and Assessment at this level of the programme: Employment related skills are primarily taught through the Professional Practice module in lectures, workshops and seminars. These are embedded through monitored and supported WBL placements and assessed through student's reflective work for assessment, feedback from organisational mentors and feedback from the WBL tutor. It is also covered via the business case studies, and presentations in other modules.					
Practical Skills: Covers CB 3.4 To meet a threshold pass at this level of the programme students will be able to produce small well-constructed programmes to solve well-specified problems. They will also be able to produce work involving problem identification, the analysis, design and development of a computing system. This will include:	**Primary** • IT Laboratory work • Group Projects • Lectures and tutorials • Learning from work experience **Secondary** • Coaching by Work Mentor	1	2, 3, 6, 7	Coursework Project reports Examination preparation and completion Assessed discussions Group work assessments	HIGH1058 HIGH1059 HIGH1035

FHEQ level: 4					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
• Specify, design and construct reliable, secure and usable computer-based systems. • Evaluate systems in terms of quality attributes and possible trade-offs, presented within the given problem. • Deploy effectively the tools used for the construction and documentation of computer applications to solve practical problems.					
An explanation for embedding Practical Skills through Teaching & Learning and Assessment at this level of the programme: Practical skills are taught within workshops, seminars, VLE online exercises, formative assessment and student led feedback. Practical and computer-based assessments of skills gained are then undertaken by students.					

FHEQ level: 5					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
Knowledge / Understanding: Covered by CB 3.3ii - iv To meet a threshold pass at this level of the programme students must demonstrate a sound understanding of the main areas of the body of knowledge within Information Technology for Business, with an ability to exercise critical judgement. They will be able to demonstrate: • A sound understanding of the scientific method and its applications to problem solving in this area • A sound knowledge and understanding of essential facts, concepts, principles and theories relating to Computing and computer applications • The ability to use this knowledge and understanding in the modelling and design of computer-based systems for the purposes of comprehension,	**Primary** • College lectures, workshops and tutorials • Directed independent study • In-house courses and coaching in the workplace • Learning from work experience • Practical labs **Secondary** • Case studies • Problem-solving exercises • Individual and group research	1	1, 2, 3, 5, 6, 7	Project report Examination Coursework Practical labs	HIGH2070 HIGH2068 HIGH2067 HIGH2034 HIGH2069

FHEQ level: 5					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
communication prediction and the understanding of trade-offs.					
An explanation for embedding Knowledge and Understanding through Teaching & Learning and Assessment at this level of the programme: Knowledge and understanding are developed through, lectures, on line learning, independent and group study, etc. and enhanced by guest speakers, organisational visits and the teaching of industry professionals in specific modules. Assessment is through a range of methods including course work, examination, and practical labs					
Cognitive and Intellectual Skills: Covered by CB 3.3ii - iv To meet a threshold pass at this level of the programme students must be able to critically analyse and apply essential concepts, principles and practices of the subject in the context of loosely defined scenarios, showing effective judgement in the selection and use of tools and techniques • Recognise and critically analyse criteria and specifications appropriate to specific problems, and plan strategies for their solutions • Critically analyse the extent to which a computer-based system meets the	**Primary** • Workshops, class exercises and simulations • Tutorial/seminar discussions • Feedback via coursework assessment process • Critical reviews of information systems and computing practice in business • Learning from work experience **Secondary** • For example:	1, 2	2, 3, 5, 6, 7	Project reports Examination Coursework Group work Practical labs	HIGH2070 HIGH2068 HIGH2067 HIGH2034 HIGH2069

FHEQ level: 5					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
criteria defined for its current use and future development. • Deploy appropriate theory, practices and tools for the specification, design, implementation and in-depth evaluation of computer-based system	• Policy and practice analysis • Developing computer applications for business tasks • Coaching by workplace mentor				
An explanation for embedding Cognitive and Intellectual Skills through Teaching & Learning and Assessment at this level of the programme: At this level students are supported in developing cognitive skills through in class exercises, including discussion and debate, through reviewing case studies and business practice and through problem-based learning. These skills are tested in in reports, group work, course work and presentations.					
Key Transferable Skills: Covers CB 3.5ii – 3.5iv and GMB 3.9 To meet a threshold pass at this level of the programme students will be able to demonstrate well developed study skills, including. This includes • Demonstrate good literacy skills and the ability to construct well-argued and grammatically correct documents. • Demonstrating good numerical skills and a well-developed ability to process and	**Primary** • Class and seminar interactions and feedback • Group work awareness and practice • Research exercises • Learning from work experience **Secondary** • Library and other research exercises	1, 2, 3	2, 3, 4, 7, 8	Coursework Project reports Examination preparation and completion Assessed discussions Group work assessments	HIGH2070 HIGH2068 HIGH2067 HIGH2034

FHEQ level: 5					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
interpret qualitative and quantitative data for business and computing purposes • Locating and retrieving relevant ideas from a wide range of sources, and ensure these are correctly and accurately referenced and attributed • Demonstrating a well-developed ability to reflect on the outcome of their work • Working unsupervised, plan effectively to meet deadlines • Succinctly presenting rational and reasoned arguments that address a given problem or opportunity, to a range of audiences orally and in writing.					
An explanation for embedding Key Transferable Skills through Teaching & Learning and Assessment at this level of the programme: Transferable skills are taught in a number of different ways across the programme and in different modules. These are strengthened through WBL, feedback from organisation mentors, the company appraisal system and feedback from the WBL tutor. They are assessed in different ways in different modules					
Employment Related Skills: Covered by CB (3.5 V – Vii)	• IT Laboratory work • Group Projects • Lectures and tutorials	2	4, 8	Coursework Project reports	HIGH2070 HIGH2068 HIGH2067 HIGH2034 HIGH2069

FHEQ level: 5					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
For a threshold pass at this level students will be able to apply appropriate practices within a professional, legal and ethical framework • Demonstrate Team working skills by: - Recognise and make best use of the skills and knowledge of individuals to collaborate. - Identify problems and desired outcomes and negotiate to mutually acceptable conclusions. • Demonstrate contextual awareness by understanding and meeting the needs of individuals, business and the community, as well as how workplaces and organisations are governed • Work under unsupervised and plan effectively to meet deadlines and respond to challenges • Succinctly presenting rational and reasoned arguments that address a given problem or opportunity, to a range of audiences orally and in writing.	• Learning from work experience • Coaching by Work Mentor			Examination preparation and completion Assessed discussions Group work assessments	

FHEQ level: 5					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
Transferable skills are taught in a number of different ways across the programme and in different modules. These are strengthened through WBL, feedback from organisation mentors, the company appraisal system and feedback from the WBL tutor. They are assessed in different ways in different modules					
Practical Skills: Covered by CB 3.4 To meet a threshold pass at this level of the programme students will be able to produce work involving problem identification, the analysis, design or development of the system with appropriate documentation, recognising the important relationship between these. Students will be able to: • Specify, design and construct reliable, secure and usable computer-based systems. • Evaluate systems in terms of quality attributes and possible trade-offs, presented within the given problem. • Plan and manage projects to deliver computing systems within constraints of requirements, timescale and budget.	• IT Laboratory work • Group Projects • Lectures and tutorials • Learning from work experience • Coaching by Work Mentor	1	2, 3, 6, 7	Coursework (essays) Coursework (Laboratory work) Project reports Examination preparation and completion	HIGH2070 HIGH2068 HIGH2067 HIGH2034 HIGH2069

FHEQ level: 5					
Definitions of Graduate Attributes and Skills Relevant to this Programme	**Teaching and Learning Strategy / Methods**	**Prog Aims**	**Prog intended Learning Outcomes**	**Range of Assessments**	**Related Core Modules**
• Deploy effectively the tools used for the construction and documentation of computer applications, with particular emphasis on understanding the whole process involved in the effective deployment of computers to solve practical problems. • Critically evaluate and analyse complex problems, including those with incomplete information, and devise appropriate solutions, within the constraints of a budget.					
An explanation for embedding Practical Skills through Teaching & Learning and Assessment at this level of the programme: Practical skills are taught within labs, projects, seminars, VLE online labs, formative assessment and student led feedback. Practical skills are assessed via the above range of assessments					

Work Based/Related Learning[2]

WBL is an essential element of Foundation Degrees and therefore needs to be detailed here. However, for all types of HE programmes there should be an element of employability focus through, at least, Work Related Learning, and therefore the following is applicable for all:

FHEQ Level: 4					
WBL/WRL Activity:	**Logistics**	**Prog Aim**	**Prog Intended LO**	**Range of Assessments**	**Related Core Module(s)**
• Extensive Work - based Learning placements in organisations. • Researching the sector and individual organisations. • Preparation of CV. • Multiple interviews for placement. • Payment in placement subject to satisfactory performance. • Visits to business organisations. • Employed Sector specialists, employed as part-time teaching staff. • Guest lecturers	WBL- students undertake a minimum of 10 weeks in placement in either 1 or 2 blocks Students prepare CVs as part of their professional practice modules. An interviewing process involving partner organisations and all students is organised As part of the professional practice module the class visits business organisations in the locality. Qualified part-time lecturing staff are drawn from the sector.	1, 2, 3	1, 2, 3, 4, 5, 6, 7, 8	Reflective Journal/ portfolio Portfolio of evidence Presentations Reports	HIGH1054 HIGH1051 HIGH1055

[2] The provided table includes only a single line. This will need replicating for each WBL/WRL activity (i.e., placements / real-world industry provided problems to solve / visits / trade shows etc). Additionally, the table should be replicated for each stage of the programme for clarity.

	Guest lecturers with specialist knowledge contribute teaching in specific modules				

An explanation of this map:

Work Based Learning is fundamental to the learning experience of the FdSc Information Technology for business. Preparation for placement including research, CV preparation, interviews with placement organisations, Work etiquette, WBL, mentoring within the organisation, programme support are all provided through the professional practice module. Assessment is focussed around reflective work and the student's engagement with the placement organisation. The work-placements are designed to give students sufficient exposure to industry in order to gain relevant industry skills and – potentially – qualifications. Students are expected to complete the full amount of work-based learning in order to achieve their foundation degree. Under exceptional circumstances, cases may be considered individually. The responsibility for securing and maintaining a work placement is the student's; however, the course team will provide full support.

FHEQ level: 5					
WBL/WRL Activity:	**Logistics**	**Prog Aim**	**Prog Intended LO**	**Range of Assessments**	**Related Core Module(s)**
• Extensive Work Based Learning placements in organisations. • Sector specialists employed as part-time teaching staff. • Guest lecturers, • Study tour. • Attendance at CPD Events • Problem Based Learning	WBL- students undertake a minimum of 10 weeks in placement as 1 block. Students normally go back into placement with their Year 1 placement organisation. Several modules have assessment linked to work placements	1, 2, 3	1, 2, 3, 4, 5, 6, 7, 8	Case Studies Critical appraisal of organisational practice Reports	HIGH2070 HIGH2068 HIGH2034

	Qualified part-time lecturing staff are drawn from the sector. Guest lecturers with specialist knowledge contribute teaching in specific modules CPD Events held by professional bodies				
An explanation of this map: Teaching learning and assessment at Level 5 is focussed on the discussion and analysis of theory and best practice related to the industry practice students see within their placement organisation. Organisational practices, process and literature are used in problem-based learning as is case study work.					

5. Module Records

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH1051	**MODULE TITLE:** Business Relationship and Customer Service Management	
CREDITS: 20	**FHEQ LEVEL:** Level 4	**JACS CODE:** N100
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
All businesses have to interact with their customers and a range of external stakeholders (e.g. customers, suppliers, shareholders and partners). This module examines how these relationships are managed and how competitive advantage is achieved.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)		**C1** (Coursework)	60%
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical)	40%

SUBJECT ASSESSMENT PANEL to which module should be linked: Business

Professional body minimum pass mark requirement: N/A

MODULE AIMS:

- Develop a knowledge and understanding of the role and needs of the key external stakeholders of a business;
- Develop knowledge and understanding of how businesses manage relationships with stakeholders and obtain benefits;
- Analyse how stakeholder needs are being satisfied in a specific work context and how businesses are generating competitive advantage from the relationship;
- Understand the creation of customer satisfaction in a range of business, finance, sport and fitness sectors and its business benefits;
- Understand how customer service is designed, developed and delivered;
- Understand the effective management of customer service.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	Award/ Programme Learning Outcomes contributed to
1. Demonstrate knowledge of the key stakeholders, their needs and role for the organisation. 2. Demonstrate knowledge and understanding of the concepts and techniques to manage effective relationships with stakeholders; and	**Module ILOs** Meets ILOs 1, 2 3, and 4 Presentation meets ILOs 1 and 2 Links to all ILOs through the process of reflection and critical self-awareness. **Programme ALOs** Meets ALOs 1, 2, 3, 4, 5, 6, 7 and 8.

the main theories underpinning customer service management. 3. Analyse and evaluate good practice business relationship management concepts and techniques within a work context; including the evaluation of the design and delivery of customer relationship management. 4. Apply the knowledge generated in the module, to enable the student to work effectively within the work context by demonstrating relevant relationship-building, negotiation and communication skills	1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. They will also be able to demonstrate knowledge and understanding of business systems, accounting and financial reporting, and decision making 2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance with the basic theories and concepts of computing and business and recognising the impact of real-world complexity 3. Apply and evaluate a range of approaches to manipulating and representing information, and translating business problems into structured IT solutions 4. Work as an effective member of staff, exercising personal responsibility, and undertaking additional education and training as part of their career development plan. 5. Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management 6. Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and action. 7. Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions.

	8. Work as an effective member of team, effectively communicating information, arguments and analysis in a variety of forms to specialist and non-specialist audiences and applying the concepts and principles of business and computing in a work context and in a changing environment.

DATE OF APPROVAL: 05/2015	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2015	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: N/A	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 133
MODULE LEADER: Ross Henderson	**OTHER MODULE STAFF:** None

Summary of Module Content

- Stakeholder profiles, analysing wants, needs, strengths and weaknesses.
- Theories and models associated with understanding and analysing customer service and the customer experience.
- Managing relationships
- Nature of service, services versus goods, evolution of services marketing as an academic sub-discipline, classification of services.
- The extended enterprise: value chains, supply chains, outsourcing; strategy, organisation, benefits and risk
- Communication in relationship management, including sector associations, organisational and personal networks
- IT systems to support relationship management
- Service design and delivery – blueprinting and service mapping, benchmarking, complexity, diversity and lines of visibility, roles/scripts of employees.
- Service quality and satisfaction – expectations of services, dis-confirmation/gap theories, relationship between service quality and satisfaction.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Lectures	48	20 x 1.5 hour lectures
Guided independent learning	72	Areas of focus for reading provided within lectures, seminars, workshops and assessment briefs
Work-based learning	80	Research into the service and RM processes at the placement organisation
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework (C1)	Business report	100%
Practical (P1)	Individual presentation	100%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1 and P1 (in lieu of the original assessment)	Business report Individual presentation	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Ross Henderson Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH1054	**MODULE TITLE:** Professional Practice	
CREDITS: 20	**FHEQ LEVEL:** Level 4	**JACS CODE:** N190
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
Designed to enable students to demonstrate they have all the qualities and transferable skills necessary for relevant employment requiring the exercise of responsibility and decision making, including the ability to relate their professional practice to underlying theory and principles.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)		**C1** (Coursework)	100%
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:

- To enable students to develop a comprehensive portfolio of evidence that supports their career development and professional practice;
- To enable students to demonstrate an approach to their practice that is informed by up to date and relevant theoretical perspectives;
- To support students in developing as autonomous learners at HE level.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	Award/ Programme Learning Outcomes contributed to
1. Identify, locate, evaluate and use information appropriate to the task in hand. 2. Work independently and in a team in a manner that meets professional requirements. 3. Demonstrate the ability to communicate effectively in styles appropriate for a variety of professional purposes and audiences. 4. Evaluate and reflect upon, own strengths and areas requiring further development, as part of the continuing Personal Development Plan (PDP).	**Module ILOs** Students will present evidence of the personal development planning, linked to the work-placement. ILO 2, 3 and 4. Each student will be assessed on their work-based learning (WBL) ILO 1, 2 and 4. **Programme ALOs** Meets ALOs 1, 2, 3, 4, 5, 6, 7 and 8. 1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. They will also be able to demonstrate knowledge

	and understanding of business systems, accounting and financial reporting, and decision making. 2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance with the basic theories and concepts of computing and business and recognising the impact of real-world complexity. 3. Apply and evaluate a range of approaches to manipulating and representing information and translating business problems into structured IT solutions. 4. Work as an effective member of staff, exercising personal responsibility, and undertaking additional education and training as part of their career development plan. 5. Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management. 6. Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions. 7. Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions. 8. Work as an effective member of team, effectively communicating information, arguments and analysis in a variety of forms to specialist and non-specialist audiences and applying the concepts and principles of business and computing in a work

	context and in a changing environment.

DATE OF APPROVAL: 05/2015	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2015	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: 05/2015	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 133
MODULE LEADER: Sean Dettman	**OTHER MODULE STAFF:** Andrew McGinnigle

Summary of Module Content

- Academic literacy and research conventions in their chosen field;
- The requirements of professional practice;
- Informed reflection, self-evaluation and personal action planning;
- Relevant ICT competences to support academic and professional practice;
- Information literacy, including search strategies, identification and critical selection of quality, scholarly information;
- Employability skills: including creative thinking, presentation, communication, negotiation, team working, effective communication at meetings.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Lectures	50	1.5 hour lecturers
Visits	24	
Guided independent learning	86	Wider reading; professional development activities in the workplace
Work-based learning	40	Reflecting on performance in the workplace.
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework (C1)	Personal Development Plan Work-based learning documentation	50% 50%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1 (in lieu of the original assessment)	Personal Development Plan Work-based learning documentation	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Sean Dettman Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH1055	**MODULE TITLE:** Business Information Systems	
CREDITS: 20	**FHEQ LEVEL:** Level 4	**JACS CODE:** G500
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
Modern businesses use a range of information systems to improve productivity and/or gain competitive advantage. This module looks at IT systems their benefits, how they are managed, and the way information is processed, used and secured.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)		**C1** (Coursework)	100%
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:
- Understand information needs within a business environment;
- Understand how the better or different use of information can create benefits for the organisation;
- Evaluate existing information systems and processes that are used within a given business environment;
- Understand the management processes that must be adopted to ensure effective data input and interpretation;
- Understand the need for information security and analyse existing security procedures;
- Apply knowledge and understanding generated in the module within the work context.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	Award/ Programme Learning Outcomes contributed to
1. Demonstrate knowledge and understanding of the uses and business benefits that information systems can bring 2. Evaluate existing information systems in terms of benefits generated and the processes used 3. Analyse existing security procedures relating to information within a business environment and propose improvements	**Module ILOs** Case studies coursework meets ILOs 1, 2, 3 and 4. **Programme ALOs** Meets ALOs 1, 2, 3, 4, 5, 6, 7 and 8. 1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. They will also

4. Effectively communicate information, arguments and analysis in a variety of forms	be able to demonstrate knowledge and understanding of business systems, accounting and financial reporting, and decision making. 2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance with the basic theories and concepts of computing and business and recognising the impact of real-world complexity. 3. Apply and evaluate a range of approaches to manipulating and representing information and translating business problems into structured IT solutions. 4. Work as an effective member of staff, exercising personal responsibility, and undertaking additional education and training as part of their career development plan. 5. Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management. 6. Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions. 7. Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions. 8. Work as an effective member of team, effectively communicating information, arguments and analysis in a variety of forms to specialist and non-specialist audiences and applying the concepts and principles of

	business and computing in a work context and in a changing environment.

DATE OF APPROVAL: 04/2011	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2011	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: 08/2015	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 119
MODULE LEADER: Paul Spencer	**OTHER MODULE STAFF:** None

Summary of Module Content

- The role of technology in business;
- Hardware, networks and communications;
- Software in business;
- Generating productivity and competitive advantage from information systems;
- Business information needs analysis;
- Management of data: input, security, interpretation and use;
- Network applications;
- E business;
- Organisational information systems;
- Media, publishing and information sharing.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Lectures	30	20 x 1.5 hour lecturers
Seminars	30	20 x interactive sessions exploring various focussed study topics
Guided independent learning	60	Includes independent lab work, research and coursework
Work-based learning	80	Continued work-based learning commitments including researching the use of and applying knowledge and skills within the workplace.
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework (C1)	Case Studies Complete questions from 8 case studies taken from Essentials of MIS, 11th Edition, Laudon & Laudon, Pearson Aggregate mark based on best 7	100%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1 (in lieu of the original assessment)	Coursework – Case Studies Complete questions from 8 case studies taken from Essentials of MIS, 11th Edition, Laudon & Laudon, Pearson Aggregate mark based on best 7	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Paul Spencer Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH1058	**MODULE TITLE:** Fundamentals of Networks	
CREDITS: 20	**FHEQ LEVEL:** Level 4	**JACS CODE:** I200
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** No

SHORT MODULE DESCRIPTOR:
This module introduces students to the core concepts and technologies used for data communication networks. It deals with network media, protocols, standards and techniques that enable the operation of networks within a business environment.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)	50%	**C1** (Coursework)	
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	50%

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:

- Recognise, specify and evaluate network topologies, media, and components;
- Define the purpose and use of network protocols and standards and evaluate their appropriateness;
- Design and implement simple Ethernet networks using specified protocols, standards, media and components for a business environment;
- Analyse the operation and features of the transport, communication and network layer protocols and services;
- Apply the knowledge and skills developed in this module in the work context.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	Award/ Programme Learning Outcomes contributed to
1. Demonstrate knowledge and understanding of network topologies, media, and components 2. Apply network protocol models 3. Explain the layers of the OSI layer model 4. Evaluate network protocols and standards 5. Design and implement simple Ethernet networks using specified protocols, standards, media and	**Module ILOs** Written exam ILO 1, 3 and 4. Practical ILO 2, 5 and 6. **Programme ALOs** Meets ALOs 1, 2, 3, 5, 6 and 7. 1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. They will also be able to demonstrate knowledge

components for a business environment 6. Apply the knowledge and skills developed in this module in the work context	and understanding of business systems, accounting and financial reporting, and decision making. 2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance with the basic theories and concepts of computing and business and recognising the impact of real-world complexity. 3. Apply and evaluate a range of approaches to manipulating and representing information and translating business problems into structured IT solutions. 4. Work as an effective member of staff, exercising personal responsibility, and undertaking additional education and training as part of their career development plan. 5. Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management. 6. Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions. 7. Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions.

DATE OF APPROVAL: 05/2013	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2013	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: 08/2015	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 121
MODULE LEADER: Peter Hopley	**OTHER MODULE STAFF:** None

Summary of Module Content

- Logical and physical network topologies and main features of networking technologies;
- Subnetting, IP addressing and the TCP/IP protocols and services suite;
- Troubleshooting and network diagnostic techniques;
- Recognise the devices and services that are used to support communications across an Internetwork;
- Understand the importance of addressing and naming schemes at various layers of data networks;
- Understand and analyse the protocols and services provided by the layers in the OSI and TCP/IP models.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Lectures	15	10 x 1.5 hour lecturers
Seminars	15	10 x interactive sessions exploring various focussed study topics
Practical classes and workshops	30	20 x 1.5 hour lab sessions applying theory
Guided independent learning	100	Includes independent lab work, research and coursework
Work-based learning	80	Continued work-based learning commitments including researching the use of and applying knowledge and skills within the workplace.
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Examination (E1)	Written examination	50%
Practical (P1)	Practical laboratory Assessments	50%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
E1 and P1	Written examination and practical	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Peter Hopley Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH1059	**MODULE TITLE:** Software Development	
CREDITS: 20	**FHEQ LEVEL:** Level 4	**JACS CODE:** H610
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
This module looks at key aspects of software design, programming language and software applications within a business environment.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)		**C1** (Coursework)	40%
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	60%

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:

- Understand and recognise the key aspects of best practice software design, structure and development;
- Use a current programming language to develop software applications;
- Use software design and development tools to create software applications;
- Document and test a software application;
- Evaluate software applications in use within a business environment.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	Award/ Programme Learning Outcomes contributed to
1. Demonstrate knowledge and understanding of best practice software design, structure and development 2. Use current programming language to develop software applications 3. Apply software design and development tools to create software applications 4. Document and test a software application 5. Evaluate software applications in use within a business environment	**Module ILOs** Coursework ILO 1. Practical ILOs 2, 3, 4 and 5. **Programme ALOs** Meets ALOs 1, 2, 3, 5, 6 and 7. 1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. They will also be able to demonstrate knowledge and understanding of business systems, accounting and financial reporting, and decision making.

	2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance with the basic theories and concepts of computing and business and recognising the impact of real-world complexity. 3. Apply and evaluate a range of approaches to manipulating and representing information and translating business problems into structured IT solutions. 5 Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management. 6 Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions. 7 Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions.

DATE OF APPROVAL: 05/2013	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2013	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: 08/2015	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 121
MODULE LEADER: Christopher Talbot	**OTHER MODULE STAFF:** None

Summary of Module Content

- Programming languages; object-oriented, UML;

- Features of a programming language; variables, arrays, loops, conditional statements, case statements, logical operators, input statements and output statements;
- Data types; text, integer, floating point, Boolean;
- Software development life cycle;
- Design tools; structure diagrams, DFDs and ERM; UML;
- Software structures and language syntax;
- Accessing and modifying persistent data structures;
- Documentation;
- Testing and debugging;
- Evaluation of fitness for purpose.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Lectures	15	10 x 1.5 hour lecturers
Seminars	15	10 x interactive sessions exploring various focussed study topics
Practical classes and workshops	30	20 x 1.5 hour lab sessions applying theory
Guided independent learning	100	Includes independent lab work, research and coursework
Work-based learning	40	Continued work-based learning commitments including researching the use of and applying knowledge and skills within the workplace.
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework (C1)		40%
Practical (P1)	Practical laboratory assessments	60%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1 and P1	Coursework and practical	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Christopher Talbot Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH1035	**MODULE TITLE:** IT Systems, Service and Support	
CREDITS: 20	**FHEQ LEVEL:** Level 4	**JACS CODE:**
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** No

SHORT MODULE DESCRIPTOR:
This module introduces students to the importance of IT as a strategic organisational resource and the key challenges that are faced when delivering IT systems, services and support within organisations.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)	50%	**C1** (Coursework)	50%
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:

- Recognise that IT services are crucial for the delivery of an organisation's business objectives;
- Understand the key systems and support techniques for delivering IT services to organisations;
- Apply best practice when analysing requirements and delivering services to support IT systems within organisations.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	Award/ Programme Learning Outcomes contributed to
1. Demonstrate knowledge and best practice models for delivering IT services to organisations 2. Analyse IT service requirements within organisations 3. Apply best practice solutions for the provision of IT services 4. Evaluate the most appropriate IT systems, services and support procedures for organisations	**Module ILOs** Written examination ILO 1. Business report ILOs 2, 3 and 4. **Programme ALOs** Meets ALOs 1, 2, 3, 5, 6 and 7. 1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. They will also be able to demonstrate knowledge and understanding of business

	systems, accounting and financial reporting, and decision making. 2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance with the basic theories and concepts of computing and business and recognising the impact of real-world complexity. 3. Apply and evaluate a range of approaches to manipulating and representing information and translating business problems into structured IT solutions. 5 Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management. 6 Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions. 7 Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions.

DATE OF APPROVAL:	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION:	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE:	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:**
MODULE LEADER: Adrien Mehret	**OTHER MODULE STAFF:** None

Summary of Module Content

- Integrating and aligning IT and business goals;
- Implementing continual improvement;
- Measuring IT organisation effectiveness and efficiency;
- Optimising costs and Total Cost of Ownership (TCO);
- Achieving and demonstrating Return on Investment (ROI);
- Demonstrating the business value of IT;
- Developing business and IT partnerships and relationships;
- Project Delivery Success;
- Outsourcing, insourcing and smart sourcing;
- Delivering the required, business justified IT services (Service Level Agreements);
- Managing constant business and IT change;
- Demonstrating appropriate IT governance.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Lectures	15	10 x 1.5 hour lecturers
Seminars	45	30 x interactive sessions exploring various focussed study topics
Guided independent learning	100	Includes independent lab work, research and coursework
Work-based learning	40	Continued work-based learning commitments including researching the use of and applying knowledge and skills within the workplace.
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework (C1)	Business report	50%
Examination (E1)	Written examination	50%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1 and E1	Coursework and examination	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Adrien Mehret Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH2070	**MODULE TITLE:** Network Management	
CREDITS: 20	**FHEQ LEVEL:** Level 5	**JACS CODE:** I120
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
This module introduces students to the core concepts and techniques for managing network applications. Students will learn how to manage users, computers and resources within a server environment as well as evaluate appropriate security measures and implement disaster recovery operations to maintain an operational business environment.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)		**C1** (Coursework)	100%
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:
- Develop the knowledge and skills needed to manage network services within a business environment;
- Evaluate the requirements of network applications within a business environment;
- Analyse the security requirements of network applications within a business environment and implement appropriate security and disaster recovery procedures for network applications;
- Apply the knowledge generated in the module, to enable the student to work effectively within the work context.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	**Award/ Programme Learning Outcomes contributed to**
1. Demonstrate the knowledge and skills needed to manage network services within a business environment 2. Evaluate the requirements of network applications within a business environment 3. Analyse the security requirements of network applications within a business environment and develop effective approaches to manage risk 4. Implement appropriate security and disaster recovery procedures for	**Module ILOs** Work-based learning ILOs 2 and 3. Practical ILOs 1 and 4. **Programme ALOs** Meets ALOs 2, 3, 5, 6 and 7. 2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance with the basic theories and concepts of computing and

network applications within a business environment	business and recognising the impact of real-world complexity. 3. Apply and evaluate a range of approaches to manipulating and representing information and translating business problems into structured IT solutions. 5 Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management. 6 Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions 7 Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions.

DATE OF APPROVAL: 05/2013	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2013	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: 01/2019	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 121
MODULE LEADER: Adrien Mehret	**OTHER MODULE STAFF:** None

Summary of Module Content

- Installation, configuration and testing of network applications and their services;
- Monitoring and optimisation of performance;
- Management of users, computers and resources;
- Network application security and risk management;
- Disaster recovery;
- Fault Tolerance;
- Backup and restore procedures for data and services.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Scheduled	40	Lectures and Seminars
Independent	60	Guided independent learning, using VLE and online resources
Placement	100	Applying knowledge in the work context, under supervision
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework (C1)	Coursework portfolio: Report and reflection on Lab assessments	100%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1	Work-based learning report	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Adrien Mehret Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH2069	**MODULE TITLE:** Data Driven Applications	
CREDITS: 20	**FHEQ LEVEL:** Level 5	**JACS CODE:** I260
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
This module covers the core concepts and techniques relating to the development of data-driven software applications. Students gain a detailed understanding of both relational database concepts and the use of current programming techniques to manage data from a variety of sources to provide effective user-friendly data applications.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)		**C1** (Coursework)	100%
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:
- Understand and recognise the effective, user-friendly data-driven software applications;
- Use current methodologies to design data-driven software applications;
- Use software design and development tools to create a data-driven application for use in a business environment;
- Document and test a data-driven software application for use in a business environment;
- Evaluate data-driven software applications in use within a business environment.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	**Award/ Programme Learning Outcomes contributed to**
1. Demonstrate the knowledge and critical understanding of the structure of data-driven software applications 2. Apply current methodologies to design data-driven software applications 3. Use software design and development tools to create a data-driven application for use in a business environment 4. Document and test a data-driven software application for use in a business environment	**Module ILOs** Examination ILOs 1 and 2. Practical ILOs 1, 2, 3, 4 and 5. **Programme ALOs** Meets ALOs 1, 3, 5, 6 and 7. 1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. 3 Apply and evaluate a range of approaches to manipulating and

5. Critically evaluate data-driven software applications in use within a business environment	representing information and translating business problems into structured IT solutions. 5 Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management. 6 Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions. 7 Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions.

DATE OF APPROVAL: 05/2013	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2013	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: 01/2019	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 121
MODULE LEADER: Christopher Talbot	**OTHER MODULE STAFF:** None

Summary of Module Content

- Data types and structure;
- Structured Query Language (SQL), eXtensible Mark-up Language (XML);
- Connecting to data sources, Data processing;
- Entity relationships;
- Database design; logical design and the relational model, physical design;
- Selecting and querying data, creating, modifying and deleting data, synchronising data;
- Specification requirements, standards and practice;
- User access and interface;
- Documentation;
- Testing and debugging.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Scheduled	40	Lectures and Seminars
Independent	60	Guided independent learning, using VLE and online resources
Placement	100	Applying knowledge in the work context, under supervision
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework (C1)	Portfolio to include a work-based learning report and completed online labs with evidence	100%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1	Work-based learning report (new task)	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Christopher Talbot Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH2067	**MODULE TITLE:** Web Applications 1	
CREDITS: 20	**FHEQ LEVEL:** Level 5	**JACS CODE:** I150
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
This module introduces students to the core concepts, technologies for developing web applications. Students will investigate the development of web technologies, understand their impact upon business environments and apply techniques for developing web applications.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)		**C1** (Coursework)	100%
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:

- Understand the development of web technologies and their use within a business environments;
- Evaluate the impact of web technologies;
- Use web technologies to produce web applications for use in a business environment;
- Evaluate the impact of emerging web applications upon society and business.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	**Award/ Programme Learning Outcomes contributed to**
1. Demonstrate knowledge and understanding of the impact and development of web technologies and evaluate the potential influence of emerging web applications upon business environments 2. Analyse the use of web applications within a business environment and make recommendations for future development 3. Apply web technologies to produce web applications	**Module ILOs** All **Programme ALOs** Meets ALOs 1, 2, 3 and 5 1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. They will also be able to demonstrate knowledge and understanding of business systems, accounting and financial reporting, and decision making.

	2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance with the basic theories and concepts of computing and business and recognising the impact of real world complexity. 3. Apply and evaluate a range of approaches to manipulating and representing information and translating business problems into structured IT solutions. 5 Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions.

DATE OF APPROVAL: 05/2013	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2013	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: 01/2019	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 121
MODULE LEADER: Stuart Philip	**OTHER MODULE STAFF:** None

Summary of Module Content

- Historical, social and political development of the Internet;
- Functionality and applications on the Internet;
- The context in which e-business exists on the Internet;
- Current trends and development and key organisations relating to web applications;
- Characteristics and uses of Client-Side Scripting (e.g. XHTML/CSS);
- Development and uses of Web 2.0 technologies;
- Usability, accessibility, standards and validation;
- Website development process;
- Ethical and legal issues for web applications;
- Publishing and maintenance.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Scheduled lectures	40	Combination of lectures, seminars and workshops
Independent	120	Includes independent lab work, research and coursework

Placement	40	Continued work-based learning commitments including researching the use of and applying knowledge and skills within the workplace.
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework (C1)	Essay – The Internet: Best and Worst Invention of our Lifetime	100%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1	Coursework	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Stuart Philip Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH2049	**MODULE TITLE:** Wide Area Networks and Security	
CREDITS: 20	**FHEQ LEVEL:** Level 5	**JACS CODE:** I120
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
This module looks at switching, routing and WAN technologies and their use within a business environment.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)	25%	**C1** (Coursework)	
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	75%

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:

- Develop a critical understanding of the principles, concepts and use WAN technologies;
- Evaluate and specify WAN requirements for a business network;
- Analyse and evaluate the security implications associated with WAN technologies;
- Apply appropriate network security strategies for a WAN within a business environment;
- Apply the knowledge and skills developed in this module in the work context.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	**Award/ Programme Learning Outcomes contributed to**
1. Demonstrate knowledge and critical understanding of switching, routing and WAN technologies and their use within a business environment 2. Analyse and specify the switching, routing and WAN requirements for a business network 3. Demonstrate knowledge and critical understanding of the security implications associated with WAN technologies 4. Evaluate and apply appropriate network security strategies for a WAN within a business environment	**Module ILOs** Examination ILOs 2 and 4. Practical laboratory assessments ILOs 1 and 3.

DATE OF APPROVAL: 05/2013	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2013	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: 08/2015	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 121
MODULE LEADER: Rob Elvidge	**OTHER MODULE STAFF:** None

Summary of Module Content

- Voice Over IP / Video Over IP;
- Firewalls, Proxies, DMZ;
- CLI commands to perform basic router and switch configurations and verification;
- Security and authentication protocols;
- WAN technologies, access technologies and remote access technologies;
- VPNs, Access Control Lists, Router based DHCP and DNS;
- PPP connectivity;
- WAN topologies and WAN optimisation; transport, redundancy, applications;
- Security, threats policies and procedures, vulnerability and risk;
- Authentication methods, cryptography, algorithms, signatures, hardware versus software;
- Device Security, security topologies, security baselines;
- Intrusion detection, application hardening.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Lectures	15	10 x 1.5 hour lecturers
Seminars	15	10 x interactive sessions exploring various focussed study topics
Practical classes and workshops	30	20 x 1.5 hour lab sessions applying theory
Guided independent learning	100	Includes independent lab work, research and coursework
Work-based learning	40	Continued work-based learning commitments including researching the use of and applying knowledge and skills within the workplace.
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Examination (E1)	Written examination	25%
Practical (P1)	Practical laboratory assessments	75%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1 and P1	Examination and practical laboratory assessments	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH2068	**MODULE TITLE:** Systems Analysis and Design	
CREDITS: 20	**FHEQ LEVEL:** Level 5	**JACS CODE:**
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
This module provides students with a detailed understanding of the systems analysis life cycle, allowing them to use the tools and techniques to perform a comprehensive system investigation to create the detailed design and documentation for an information system.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)		**C1** (Coursework)	100%
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:

- Develop a critical understanding of the role, principles and approaches to systems analysis within the development of an information system;
- Develop understanding and skills in the use of methodologies, tools and techniques used within systems analysis and design;
- Critically evaluate the strengths and weaknesses of existing information systems, and propose enhancements;
- Document and communicate the investigation and design of an information system using an appropriate systems analysis life cycle model and communicate it to expert and non-experts;
- Apply the knowledge generated in the module, to enable the student to work effectively within the work context.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	Award/ Programme Learning Outcomes contributed to
1. Demonstrate the knowledge and critical understanding of the role, principles and approaches to systems analysis within the development of an information system 2. Apply methodologies, tools and techniques used within systems analysis and design	**Module ILOs** All **Programme ALOs** Meets ALOs 1, 2, 3, 4, 5, 6 and 7 1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. They will also

3. Critically evaluate the strengths and weaknesses of existing information systems, and propose enhancements 4. Document the investigation and design of an information system using an appropriate systems analysis life cycle model	be able to demonstrate knowledge and understanding of business systems, accounting and financial reporting, and decision making. 2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance with the basic theories and concepts of computing and business and recognising the impact of real-world complexity. 3. Apply and evaluate a range of approaches to manipulating and representing information and translating business problems into structured IT solutions. 4. Work as an effective member of staff, exercising personal responsibility, and undertaking additional education and training as part of their career development plan. 5. Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management. 6. Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions. 7. Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions.

DATE OF APPROVAL: 24/06/2015	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2015	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: 01/2019	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 121
MODULE LEADER: Christopher Talbot	**OTHER MODULE STAFF:** None

Summary of Module Content

- Evaluate systems analysis life cycle models;
- Investigation models, methodologies and systems theory;
- Key drivers and constraints for systems analysis and design;
- Systems analysis procedures, documentation, standards and protocols;
- Design (for development, implementation, use and maintenance) and testing;
- Systems within an organisation, requirements, specification and feasibility;
- System design: strengths and weaknesses of relevant methodologies and techniques;
- People and interface issues; compliance with legal, ethical and quality standards.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Scheduled	44	Lectures and seminars
Independent	56	Includes independent lab work, research and coursework
Placement	120	Continued work-based learning commitments including researching the use of and applying knowledge and skills within the workplace.
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework (C1)	Work-based learning business reports x 2	100%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1	Coursework (in lieu of original assessment)	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Christopher Talbot Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH2034	**MODULE TITLE:** IT Project Management	
CREDITS: 20	**FHEQ LEVEL:** Level 5	**JACS CODE:**
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
This module covers what is involved in managing the implementation of an IT project. Students will learn how to specify, plan, manage, implement, test and review the implementation of projects within a business environment.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)		**C1** (Coursework)	100%
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:

- Understand how projects are specified, planned and agreed;
- Develop the knowledge and critical understanding which will enable them to successfully implement a project;
- Develop the skills needed to manage and monitor the implementation of a project;
- Test, document and review a project;
- Apply the knowledge generated in the module, to enable the student to work effectively within the work context.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	Award/ Programme Learning Outcomes contributed to
1. Demonstrate the knowledge and critical understanding of how projects are specified and implemented 2. Critically apply recognised project management techniques and demonstrate the knowledge and skills needed to successfully manage the implementation of a project 3. Document and critically evaluate a project, identifying key learning points for future projects	**Module ILOs** Coursework work-based learning business report meets ILOs 1. Coursework business documentation meets ILOs 1, 2 and 3. **Programme ALOs** Meets ALOs 1, 2, 3, 4, 5, 6, 7 and 8. 1. Demonstrate knowledge and understanding of a range of: computer languages and the essential features of structured programming; computer architecture, operating systems and networks. They will also

	be able to demonstrate knowledge and understanding of business systems, accounting and financial reporting, and decision making. 2. Present and evaluate quantitative and qualitative data, to develop and communicate lines of argument and make sound judgements in accordance with the basic theories and concepts of computing and business and recognising the impact of real-world complexity. 3. Apply and evaluate a range of approaches to manipulating and representing information and translating business problems into structured IT solutions. 4. Work as an effective member of staff, exercising personal responsibility, and undertaking additional education and training as part of their career development plan. 5. Demonstrate knowledge and critical understanding of requirements analysis, systems design and implementation, databases, human computer interactions, and project management, IT operations, customer and supplier management. 6. Apply underlying concepts and principles outside the context in which they were first studied, and to understand the limits of their knowledge and how that influences analyses, interpretations and actions. 7. Use a range of established approaches to initiate and undertake critical analysis of information and business/client needs, to propose and develop solutions to problems arising from that analysis, and critically evaluate the strengths and weaknesses of approaches, arguments and solutions. 8. Work as an effective member of team, effectively communicating information, arguments and analysis in a variety of forms to specialist and non-specialist audiences and applying the concepts and principles of

	business and computing in a work context and in a changing environment.

DATE OF APPROVAL: 24/06/2018	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2018	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: N/A	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 121
MODULE LEADER: Peter Hopley	**OTHER MODULE STAFF:** None

Summary of Module Content

- Project life cycles and methodologies including traditional and iterative and agile techniques;
- Critical success factors for projects;
- Project management tools;
- Project definition: scope, costs, benefits and risks;
- Project planning, scheduling and costing;
- Risk, contingency management, execution and control;
- Managing changes and closeout, quality, stakeholders and resources;
- Performance reporting and documentation;
- Learning from a project.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Lectures	15	10 x 1.5 hour lecturers
Seminars	20	20 x interactive sessions exploring various focussed study topics
Practical classes and workshops	15	10 x 1.5 hour lab sessions applying theory
Guided independent learning	100	Includes independent lab work, research and coursework
Work-based learning	40	Continued work-based learning commitments including researching the use of and applying knowledge and skills within the workplace.
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Coursework (C1)	Work-based learning report	40%
	Business documentation	60%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
C1	Work-based learning business report and documentation	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Peter Hopley Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

UNIVERSITY OF PLYMOUTH MODULE RECORD

SECTION A: DEFINITIVE MODULE RECORD

MODULE CODE: HIGH2050	**MODULE TITLE:** Web Applications 2	
CREDITS: 20	**FHEQ LEVEL:** Level 5	**JACS CODE:** I150
PRE-REQUISITES: None	**CO-REQUISITES:** None	**COMPENSATABLE:** Yes

SHORT MODULE DESCRIPTOR:
This module enables the student to develop dynamic web applications. It covers the underpinning concepts, strategies, software and techniques relating to the latest technologies for web development.

ELEMENTS OF ASSESSMENT *[Use HESA KIS definitions] – see Definitions of Elements and Components of Assessment*			
E1 (Examination)	70%	**C1** (Coursework)	
E2 (Clinical Examination)		**A1** (Generic assessment)	
T1 (Test)		**P1** (Practical**)**	100%

SUBJECT ASSESSMENT PANEL to which module should be linked: Computing

Professional body minimum pass mark requirement: N/A

MODULE AIMS:
- Understand dynamic web scripting technologies;
- Use dynamic web scripting techniques;
- Develop dynamic web applications;
- Understand the security issues affecting the implementation of dynamic web applications.

ASSESSED LEARNING OUTCOMES: At the end of the module the learner will be expected to be able to:

Assessed Module Learning Outcomes	**Award/ Programme Learning Outcomes contributed to**
1. Demonstrate knowledge and critical understanding of dynamic web application technologies 2. Design dynamic web applications for a specified business need 3. Apply dynamic web application scripting techniques 4. Develop and critically evaluate dynamic web applications 5. Demonstrate the knowledge and critical understanding of the security issues affecting the implementation of dynamic web applications and specifying appropriate enhancements	**Module ILOs** Practical assessed component meets ILOs 1, 2, 3, 4 and 5.

DATE OF APPROVAL: 05/2013	**FACULTY/OFFICE:** Academic Partnership
DATE OF IMPLEMENTATION: 09/2013	**SCHOOL/PARTNER:** Highlands College UCJ
DATE OF APPROVED CHANGE: 06/2015	**SEMESTER:** 1 and 2

SECTION B: DETAILS OF TEACHING, LEARNING AND ASSESSMENT

ACADEMIC YEAR: 2019-20	**NATIONAL COST CENTRE:** 121
MODULE LEADER: Jay Padden	**OTHER MODULE STAFF:** None

Summary of Module Content

- Web server scripting technologies;
- Internet Information Servers, Apache;
- XHTML, PHP, ASP, AJAX, JavaScript, XML;
- Testing and debugging;
- Security; SSL, HTTPS;
- Deploying web applications;
- Web applications architecture;
- Accessing and modifying persistent data structures.

SUMMARY OF TEACHING AND LEARNING		
Scheduled Activities *[KIS definitions]*	**Hours**	**Comments/Additional Information (briefly explain activities, including formative assessment opportunities)**
Lectures	15	10 x 1.5 hour lecturers
Seminars	15	10 x interactive sessions exploring various focussed study topics
Practical classes and workshops	30	10 x 1.5 hour lab sessions applying theory
Guided independent learning	100	Includes independent lab work, research and coursework
Work-based learning	40	Continued work-based learning commitments including researching the use of and applying knowledge and skills within the workplace.
Total	**200**	**(NB: 1 credit = 10 hours of learning; 20 credits = 200 hours, etc.)**

SUMMATIVE ASSESSMENT

Element Category	Component Name	Component Weighting
Practical (P1)		100%

REFERRAL ASSESSMENT

Element Category	Component Name	Component Weighting
P1	Practical assessment	100%

To be completed when presented for Minor Change approval and/or annually updated	
Updated by: Jay Padden Date: 01/09/2019	**Approved by**: Ben Bennett Date: 01/09/2019

Additional Guidance for Learning Outcomes:

Guidance for Learning Outcomes is given below; please refer to the Programme Specification for relevant Award Learning Outcomes.

To ensure that the module is pitched at the right level check your intended learning outcomes against the following nationally agreed standards

Framework for Higher Education Qualifications
http://www.qaa.ac.uk/publications/information-and-guidance/publication/?PubID=2718#.VW2INtJVikp
Subject benchmark statements
http://www.qaa.ac.uk/ASSURINGSTANDARDSANDQUALITY/SUBJECT-GUIDANCE/Pages/Subject-benchmark-statements.aspx
Professional, regulatory and statutory (PSRB) accreditation requirements (where necessary e.g. health and social care, medicine, engineering, psychology, architecture, teaching, law)
QAA Quality Code http://www.qaa.ac.uk/AssuringStandardsAndQuality/quality-code/Pages/default.aspx