



**Institute for Apprenticeships
& Technical Education**

Higher technical qualification submission form

Awarding body information

Awarding body information

What is the name of the awarding body?

University of Plymouth, delivered by University Centre South Devon (UCSD) - a trading name of South Devon College

Is the awarding body a higher education provider?

Yes

Is the awarding body on the Office for Students register?

Yes

Qualification information

Qualification information

You can only submit one qualification for each form. If you are submitting multiple qualifications you must start a new form for each qualification. Please include the name of the qualification as it appears on Ofqual register or UCAS. Include the size of the qualification. e.g. award, certificate, diploma

What is the name of the qualification?

FdSc Computing

Is the qualification on the Ofqual register?

No

If the qualification is not regulated by Ofqual, the organisation owning the qualification must be OfS regulated. This is typically the case of qualifications from Higher Education Providers. For organisations which are Ofqual regulated, the specific qualification must be on the Ofqual register for the application to be progressed. The form will not prevent continuing if this is not completed, but your application cannot be progressed by the approval managers following submission if the awarding organisation is regulated by Ofqual but the qualification is not.

What is the level of the qualification?

Level 5

Route and occupational standards

Route and occupational standards

Awarding bodies must demonstrate that a qualification will enable a person to demonstrate that they have

attained as many of the knowledge, skills and behaviours set out in the standard as may be reasonably expected by undertaking a course of education.

Please note:

- Qualifications will only be considered for approval against occupational standards approved by the Institute.

If qualifications have optional units or pathways, we will only approve qualifications where every possible combination of units/ pathways ensures that a learner achieves competence in at least one occupation for which there is a standard. Qualifications with optional units that do not ensure this should be redesigned or remove optional units that do not align to occupations.

Awarding bodies must fill out all sections of this form. They must also submit supporting documentation to provide evidence of the following:

- The content of the qualification (for example, the specification of content)
- Evidence of employer engagement in the development and validation of the qualification (for example this could be within the qualification design and validation documentation that was used through the development of the qualification which evidences where and how employers were involved)

Which route does the qualification fall under?

Digital

Which occupational standards are aligned to the qualification?

Network engineer/Level: 4

Software developer/Level: 4

Attach documents

Please attach the following documents:

- The content of the qualification (for example, the specification of content)
- Evidence of employer engagement in the development and validation of the qualification (for example this could be within the qualification design and validation documentation that was used through the development of the qualification which evidences where and how employers were involved)

Network engineer

Network engineer

Knowledge, skills and behaviours coverage within the qualification

Please identify which knowledge, skill and behaviour statements from the occupational standard are covered within the qualification.

Where knowledge, skill and behaviour statements are covered, please provide a reference to the qualification content. This should be a unit or module reference along with associated page/paragraph/line numbers (as appropriate) in the attached specification. Please be as specific as possible which content in the qualification aligns to the statement in the standard.

Where knowledge, skill or behaviour statements are partially covered or not covered, you will be asked to provide a rationale for the exclusion of this content from the qualification. The employer engagement evidence provided should support this rationale.

The following questions assess how knowledge, skill and behaviour statements from the occupational standards are covered within the qualification.

This page has automatically generated an item for each knowledge, skill and behaviour statement (KSB) contained within the chosen standard. So please do not remove or add any further KSBs, as it requires the exact number.

KSBgenerator

KSB

KSB 1

K1 The causes and consequences of network and IT infrastructure failures.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 2

K2 The architecture of typical IT systems, including hardware, OS, server, virtualisation, voice, cloud, and applications.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 3

K3 The techniques for systems performance and optimisation.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 4

K4 Diagnostic techniques and tools to interrogate and gather information regarding systems performance.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 5

K5 Organizational procedures to deal with recording information effectively and in line with protocols.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 6

K6 Service Level Agreements (SLAs) and their application to delivering network engineering activities in line with contractual obligations and customer service.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 7

K7 Their role in Business Continuity and Disaster Recovery.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 8

K8 The purposes and uses of ports and protocols.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 9

K9 Devices, applications, protocols, and services at their appropriate OSI and/or TCP/IP layers.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 10

K10 The concepts and characteristics of routing and switching.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 11

K11 The characteristics of network topologies, types, and technologies.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 12

K12 Wireless technologies and configurations.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 13

K13 Cloud concepts and their purposes.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 14

K14 Functions of network services.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 15

K15 The different types of network maintenance.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 16

K16 How current legislation relates to or impacts occupation.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 17

K17 Troubleshooting methodologies for network and IT infrastructure.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 18

K18 How to integrate a server into a network.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 19

K19 The types of security threats to networks and IT infrastructure assets.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 20

K20 How to use tools to automate network tasks.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 21

K21 Approaches to change management.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and

learning outcome that covers this criteria.

KSB 22

S1 Apply the appropriate tools and techniques when securely operating and testing Networks.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 23

S2 Install and configure the elements required to maintain and manage a secure Network.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 24

S3 Implement techniques to monitor and record systems performance in line with defined specifications.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 25

S4 Maintain security and performance of the system against known and standard threats.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 26

S5 Apply the appropriate tools and techniques to identify systems performance issues.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 27

S6 Apply the appropriate tools and techniques to gather information to troubleshoot issues and isolate, repair or escalate faults.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 28

S7 Communicate outcomes of tasks and record in line with organisational procedures and SLAs including adherence to good customer service standards.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 29

S8 Upgrade, apply and test components to systems configurations ensuring that the system meets the organisation's requirements and minimises downtime. This should include backup processes.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 30

S9 Record task details whether face-to-face, remote or in writing in line with organisational requirements.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 31

S10 Interpret information received from a manager, customer or technical specialist and accurately implement the defined requirements.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 32

S11 Monitor, identify and implement required maintenance procedures.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 33

S12 Implement techniques to optimise systems performance in line with defined specifications.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 34

S13 Organise and prioritise clients/stakeholders' requests in line with SLAs and organization processes.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 35

S14 Explain their job role within the business context to stakeholders to enable a clear understanding on both sides of what their remit is and convey technical constraints in appropriate language considering accessibility and diversity implications.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 36

S15 Operate securely and apply the appropriate process, policies, and legislation within their business responsibilities.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 37

S16 Communicate with a range of stakeholders taking into consideration of organisations cultural awareness and technical ability.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 38

S17 Apply the appropriate level of responsibility when planning and prioritizing work tasks.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 39

S18 Apply the relevant numerical skills (Binary, dotted decimal notation) required to meet the defines specifications.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 40

S19 Ensure compliance of network engineering outputs with change management processes.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 41

S20 Select the appropriate tools and comply with organisation policies and processes when upgrading systems.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 42

B1 Work independently and demonstrate initiative being resourceful when faced with a problem and taking responsibility for solving problems within their own remit.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 43

B2 Work securely within the business.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 44

B3 Work within the goals, vision, and values of the organisation.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and

learning outcome that covers this criteria.

KSB 45

B4 Take a wider view of the strategic objectives of the tasks/ projects they are working on including the implications for accessibility by users and diversity.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 46

B5 Works to meet or exceed customers' requirements and expectations.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 47

B6 Identifies issues quickly, investigates and solves complex problems and applies appropriate solutions. Ensures the true root cause of any problem is found and a solution is identified which prevents recurrence.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 48

B7 Committed to continued professional development to ensure growth in professional skill and knowledge.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

KSB 49

B8 Work effectively under pressure showing resilience.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Network Engineer Tab links to module and learning outcome that covers this criteria.

Software developer

Software developer

Knowledge, skills and behaviours coverage within the qualification

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KSBgenerator

KSB

KSB 1

K1 All stages of the software development life cycle (what each stage contains, including the inputs and outputs).

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 2

K2 Roles and responsibilities within the software development lifecycle (who is responsible for what).

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 3

K3 The roles and responsibilities of the project life cycle within your organisation, and your role.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 4

K4 How best to communicate using the different communication methods and how to adapt appropriately to different audiences.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 5

K5 The similarities and differences between different software development methodologies, such as agile and waterfall.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 6

K6 How teams work effectively to produce software and how to contribute appropriately.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and

learning outcome that covers this criteria.

KSB 7

K7 Software design approaches and patterns, to identify reusable solutions to commonly occurring problems.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 8

K8 Organisational policies and procedures relating to the tasks being undertaken, and when to follow them. For example, the storage and treatment of GDPR sensitive data.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 9

K9 Principles of algorithms, logic and data structures relevant to software development for example: arrays, stacks, queues, linked lists, trees, graphs, hash tables, sorting algorithms, searching algorithms, critical sections and race conditions.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 10

K10 Principles and uses of relational and non-relational databases

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 11

K11 Software designs and functional/technical specifications

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 12

K12 Software testing frameworks and methodologies

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 13

S1 Create logical and maintainable codes.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 14

S2 Develop effective user interfaces.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 15

S3 Link code to data sets.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 16

S4 Test code and analyse results to correct errors found using unit testing.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 17

S5 Conduct a range of test types, such as Integration, System, User Acceptance, Non-Functional, Performance and Security testing.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 18

S6 Identify and create test scenarios.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 19

S7 Apply structured techniques to problem solving, can debug code and can understand the structure of programmes to identify and resolve issues.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 20

S8 Create simple software designs to effectively communicate understanding of the program.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and

learning outcome that covers this criteria.

KSB 21

S9 Create analysis artefacts, such as use cases and/or user stories.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 22

S10 Build, manage and deploy code into the relevant environment.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 23

S11 Apply an appropriate software development approach according to the relevant paradigm (for example object oriented, event driven or procedural).

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 24

S12 Follow software designs and functional/technical specifications.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 25

S13 Follow testing frameworks and methodologies.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 26

S14 Follow company, team or client approaches to continuous integration, version and source control.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 27

S15 Communicate software solutions and ideas to technical and non-technical stakeholders.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 28

S16 Apply algorithms, logic and data structures.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 29

S17 Interpret and implement a given design whilst remaining compliant with security and maintainability requirements.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 30

B1 Works independently and takes responsibility. For example, has a disciplined and responsible

approach to risk, and stays motivated and committed when facing challenges.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 31

B2 Applies logical thinking. For example, uses clear and valid reasoning when making decisions related to undertaking work instructions.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 32

B3 Maintains a productive, professional and secure working environment.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 33

B4 Works collaboratively with a wide range of people in different roles, internally and externally, with a positive attitude to inclusion & diversity.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 34

B5 Acts with integrity with respect to ethical, legal and regulatory ensuring the protection of personal data, safety and security.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and

learning outcome that covers this criteria.

KSB 35

B6 Shows initiative for solving problems within their own remit, being resourceful when faced with a problem to solve.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 36

B7 Communicates effectively in a variety of situations to both a technical and nontechnical audience.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 37

B8 Shows curiosity to the business context in which the solution will be used, displaying an inquisitive approach to solving the problem. This includes the curiosity to explore new opportunities, and techniques; the tenacity to improve methods and maximise performance of the solution; and creativity in their approach to solutions.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 38

B9 Demonstrates creativity and tenacity in their approach to solutions and the methods used to come to a solution for example, sees the task through to the end by devising new solutions and despite obstacles and problems along the way.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

KSB 39

B10 Committed to continued professional development.

Is the statement covered within the qualification?

Fully covered

Where within the qualification is the statement covered?

Excel Spreadsheet 'L4_Net_Soft_KSB_Mapping.xlsx', Software Developer Tab links to module and learning outcome that covers this criteria.

Additional occupationally relevant content

Additional occupationally relevant content

Item 1

As well as the content aligned to the knowledge, skills and behaviours in the occupational standard, the qualification can include additional occupationally relevant content which is deemed of value to employers. Awarding bodies are asked to justify any content that does not directly align to the occupational standard, using evidence from employers.

Content should be identified at a unit or modular level and each item should be added separately by using the Add Item button. If the qualification does not include any additional content, please leave this section blank.

Unit or module containing additional content

Please give a short description of the additional content

Where within the qualification is the additional content covered?

Please provide an explanation of how the content is relevant to the occupation, including evidence from employers that supports its inclusion in the qualification.

Assessment methods

Assessment methods

Please confirm that the assessment covers all of the content relevant to the knowledge, skills and behaviours in the occupational standard.

Yes

Please outline the methods used to assess the content and provide a rationale for why these methods are valid for the qualification.

A variety of assessment types will be utilised in both formative and summative assessment. Graduates are expected to have the interpersonal, leadership and analytical skills, alongside basic business acumen, problems solving ability and a depth of specific subject knowledge and practical experience in creating and using both hardware and software systems. Assessment will therefore include presentations, including

digital presentation of software application creations, posters, critical evaluation of software applications and examination of basic concepts and fundamentals. Employers are keen on working software solutions not the ability to write huge reports on how and why software and software languages were created. The majority of assessment for software engineering modules will therefore revolve around medium to complex projects, and because of the view of employers around extraneous reports and essays, students will demonstrate the ability to utilise emerging technologies such as screen casting to demonstrate software projects and artefacts. Formative assessment will be incorporated into all lectures, seminars and labs sessions to allow for guidance and improvement in performance.

Formative assessment will be linked to summative assessments, allowing opportunities for feedback, particularly regarding transferable skills and problem solving. Students will however, still be required to engage in extensive research around the subject and formative feedback will fall in line with providing advice on techniques on how to improve performance. Regular feedback from formative activities, in tutorial, seminars and lab sessions allows students to develop not only their understanding, but also their ability to communicate their ideas and research in a variety of formats. In addition to transferrable skills, summative assessments will test fundamental facts, concepts, principles and theories relating to computing and computer applications, and the application of these to solve a variety of real world problems. These summative assessments will therefore incorporate tests, written reports, practical demonstrations and oral presentations.

All of these approaches fall in line with the key threads that are underpinned by the programme aims.

Employer engagement

Employer engagement

Please describe how employers and industry practitioners were consulted throughout the development of the qualification, including:

- the process of identifying and recruiting relevant employers
- how employers were involved in the development, review and validation of the qualification materials.

Please describe how employers and industry practitioners were consulted throughout the development of the qualification.

The South West LEP EU Structural and Investment Fund Strategy (2014) identified that 'The Heart of the SW area is already making significant improvements to its digital infrastructure' however 'investment is needed to address remaining gaps and keep up with advancing new technologies.' There is an evident need to ensure the longevity of this programme and with a regional push for filling the skills gap. The course has been designed ultimately with the benchmark statements for computing to ensure quality an educational rigour but more importantly with the fundamental support from industry the programme has been made relevant. The agile design means that the programme can adapt to industry demands and movements to ensure graduates leave with the required skills to fill potential gaps in local employment.

The college recently held a sector focus evening, which attracted employers from businesses such as Spirent and Cloudberry. The objective of the evening was to discuss the pathway to a Degree Apprenticeship and the continued development of this programme. The programme structure, module aims

and delivery content were discussed at length and it was pleasing to hear a resounding agreement towards not only the module aims but the delivery content. Questions around content of specific web development modules interested one employer and they were positive to hear that current hardware and software technologies were intended to be utilised throughout the programme.