COVERAGE: This indicates total credits covered at the top of the column with total number of modules where the KSB is covered

Cyber Security		Coverage 240	Computer architecture, Networks and Cyber 4	Introduction to Software Development 40	Business Systems and Data Analysis 40	Professional Practice 20	Pathway Project 20	Virtualisation and network security 20	Digital forensics 20	Ethical hacking 20	Cyber operation 20
technologist											
1/4		2	1								
K1 K2	O -	2	1		<u> </u>		+		1		1
	and associated security features and how assurance may be achieved in practice including penetration testing and extrinsic assurance methods	3	1						1		1
K4	the 'insider threat'. Including: - how attack techniques combine with motive and opportunity to become a	3	1	+	 		1			1	1
K5	How to deal with emerging attack techniques (including 'zero day'), hazards and vulnerabilities relevant to the	3	1							1	1
K6	Information Technology Infrastructure Library (ITIL) foundation level	1							1		
K7	requirements to support incident investigation.	3	1						1		1
К8	relevant specifically to cyber security. To include: laws, regulations & standards relating to personal data and	1									1
	ethical responsibilities of a cyber security professional	2								1	1
K10 K11	threats and overall context develop a security case which sets out the proposed security measures in the	3	1	1			1	1		1	1
K11 K12	horizon scanning including use of recognised sources of threat intelligence and vulnerabilities incorporates hardware and software components, and sources of architecture patterns and guidance. How	3	1	1			+	1		1	1
	of effective key management and the main techniques used; legal, regulatory and export issues specific to use	4	1	+			+	1		1	1
		3							1	1	1
K15	standards, guidelines and how these all work together to deliver the identified security outcomes	4						1	1	1	1
K16	digital systems; principles and common practice in digital system security	3	1							1	1
K17	programming or scripting languages	2	1							1	
	Discover vulnerabilities in a system by using a mix of research and practical exploration	4	1					1		1	1
	source of threat intelligence or advice (e.g. National Cyber Security Centre) Combine different sources to create	2				_		1		_	1
	behaviour and recommend how to defend against them. Interpret and demonstrate use of external source of	3	1		-	-				1	1
	remediation advice in the context of the employer	2	1	1		 			1	1	1
	any residual areas of concern overall context develop a security case which sets out the proposed security measures in the context with	2					+		1	1	1
	according to service level agreements or other defined performance targets	2								1	1
S8	Configure, deploy and use computer, digital network and cyber security technology	3	1					1			1
S9	future potential cyber threats and considering threat trends	2								1	1
S10	routes, to a given design requirement without supervision. Provide evidence that the system meets the design	3	1					1			1
	security case) against other design requirements (e.g. usability, cost, size, weight, power, heat, supportability	3						1		1	1
	parameters. This should include selection and configuration of typical security hardware and software	3	1					1			1
	standards	1								1	
	managing the associated encryption keys for the given scenario or system	1	1								1
S15 S16	Use tools, techniques and processes to actively prevent breaches to digital system security recognised risk assessment methodology	2	1		<u> </u>		1			1	1
S17	Identify cyber security threats relevant to a defined context	3	1				+			1	1
	audit recommendations	3	1							1	1
S19	relevant to cyber security	3	1							1	1
S20	make recommendations for remediation	3	1							1	1
	response	3							1	1	1
	continuity	2							1		1
	Assess security culture using a recognised approach	2	1	<u> </u>	<u> </u>					<u> </u>	1
S24	Design and implement a simple 'security awareness' campaign to address a specific aspect of a security culture	1	1	-	-		-			<u> </u>	1
	system monitoring tools, Secure Information and Event Management (SIEM) tools, access control systems,	3							1	1	1
	structures) and digital system behaviours (including by inspection of protocol behaviours) and by inspection of written reports within a structure or template provided	3	1	1	+		1		-	1	1
	intelligence, indicators of compromise	1	†	+	+		+			1	-
S29	negatives	1		1						1	
S30	Manage local response to non-major incidents in accordance with a defined procedure	2	1							1	
B1	undertaking the work instructions	5	1					1	1	1	1
	Analytical - working with data effectively to see patterns, trends and draw meaningful conclusions	5	1					1	1	1	1
	being supervised, and stays motivated and committed when facing challenges	4	1			_		1	_	1	1
B4	within their own remit	5	1			_	1	1	1	1	1
B5	responsibility for managing their own work load and time	2	1	-	-	-	1	1	1	1	1
B6 B7	inclusion & diversity policy	3	1	1	 		+		1	1	
B8	presenting complex information to technical and non-technical audiences Maintains a productive, professional and secure working environment	4	1	1	1	<u> </u>	1	1	1		1
		2	1	+	+		+	-	Ι	1	-
B9	approaches, bring novel and unexpected solutions to address cyber security challenges	4	1 +			-	_				

		Coverage	Computer architecture, Networks and Cyber	Introduction to Software Development	Business, Systems and Data Analysis	Professional Practice	Pathway Project	Business Intelligence and Visualisation	Data Warehousing	Al and Data Mining	Negotiated Studies
Data Analyst		240	40	40	40	20	20	20	20	20	20
K1	Current relevant legislation and its application to the safe use of data	5	1		1	1		1		1	
K2	Organisational data and information security standards, policies and procedures relevant to data management activities	4	1		1	1		1			
К3	Principles of the data life cycle and the steps involved in carrying out routine data analysis tasks.	2	1		1						
K4	Principles of data, including open and public data, administrative data, and research data	3	1		1					1	
K5	The differences between structured and unstructured data	3	1		1					1	
К6	The fundamentals of data structures, database system design, implementation and maintenance	3			1	1				1	
K7	Principles of user experience and domain context for data analytics	3	1					1		1	
К8	Quality risks inherent in data and how to mitigate/resolve these	1								1	
К9	Principal approaches to defining customer requirements for data analysis	2					1		1	1	
K10	Approaches to combining data from different sources	3	1						1	1	
K11	Approaches to organisational tools and methods for data analysis	4	1			1			1	1	
K12	Organisational data architecture	3	1						1	1	
K13	Principles of statistics for analysing datasets	2	1							1	
K14	The principles of descriptive, predictive and prescriptive analytics	1								1	
K15	The ethical aspects associated with the use of and collation of data	1								1	
S1	Use data systems securely to meet requirements and in line with organisational procedures and legislation, including principles of Privacy by Design	2	1							1	
S2	Implement the stages of the data analysis lifecycle	1			1	1			†		
S3	Apply principles of data classification within data analysis activity	2	1		<u> -</u>	1			1	1	
S4	Analyse data sets taking account of different data structures and database designs	4	1		1	1			1	1	
S5	Assess the impact on user experience and domain context on the data analysis activity	2	-		<u> -</u>	1		1	t	1	
S6	Identify and escalate quality risks in data analysis with suggested mitigation/resolutions as appropriate.	1			1	1		 	1	Ħ	
S7	Undertake customer requirements analysis and implement findings in data analytics planning and outputs	2			1	1			1	\vdash	
S8	Identify data sources and the risks, challenges to combination within data analysis activity	2	1		1	†			1	\vdash	
S9	Apply organizational architecture requirements to data analysis activities	2	†			1			1	1	
S10	Apply statistical methodologies to data analysis tasks	3	1					1	†	1	
S11	Apply predictive analytics in the collation and use of data	1	†					-		1	
S12	Collaborate and communicate with a range of internal and external stakeholders using appropriate styles and behaviours to suit the audience	2	1							1	
S13	Use a range of analytical techniques such as data mining, time series forecasting and modelling techniques to identify and predict trends and patterns in data	1								1	
S14	Collate and interpret qualitative and quantitative data and convert into infographics, reports, tables, dashboards and graphs	2						1		1	
C15	Select and apply the most appropriate data tools to achieve the best outcome	6	1	-	1	1	+	1	1	1	\vdash
S15	Maintain productive, professional and secure working environment (B8 BA)	2	1 1	-	-	1	+	1	+	1	\vdash
B1 B2	Shows initiative, being resourceful when faced with a problem and taking responsibility for solving problems	2	11	-	-	1	+	+	+	1	\vdash
טע	within their own remit (B2 and B4 BA)	3	1								
R3	Work independently and collaboratively (B3 BA)	1	1		1	1	+	+	1	1	\vdash
B3 B4	Be logical and analytical (B1 BA)	6	1		1	1	+	1	1	1	$\vdash \vdash \vdash$
B5	Identifies issues quickly, enjoys investigating and solving complex problems and applies appropriate solutions.	6	1		1	1	+	1	1	1	\vdash
55	Has a strong desire to push to ensure the true root cause of any problem is found and a solution is identified	ا	1					1			
	which prevents recurrence										
D.C.	Demonstrates resilience by viewing obstacles as challenges and learning from failure	12	1	-	-	1	+	+	 	1	\vdash
B6 B7	Demonstrates an ability to adapt to changing contexts within the scope of a project, direction of the	2	1	-	-	1	+	1	 	1	\vdash
ال	organisation or Data Analyst role.	٦				1					

		Coverage	Comp archit Netwo	Intra Soft Dev	Busi	Prof Prac	Path	Busi Inte Visu	Stra Plar	Req Engi	Neg
		Computer Architecture, Networks and Cyber Cyber		Introduction to Software Development	Business, Systems and Data Analysis	Professional Practice	Pathway Project	Business Intelligence and Visualisation	Strategic Business Planning	Requirements Engineering	Negotiated Studies
Business		240	40	40	ems ysis 40	20			ess 20	20	idies 20
Analyst		2	1		1					1	
K1 K2	The definition of Business Analysis and the range of activities that constitute it The value of Business Analysis in enabling business improvement and delivering IT system changes	Δ	1		1			1		1	
K3	The role of the Business Analyst, and its relationship with other roles on a business change initiative, including those with system development responsibilit	3	1		1	1		1		1	
K4	Business change and system development life cycles, including the use of appropriate methodologies and the	3	1		1					1	
K5	impact of organisational culture and context The principles, features and differences of waterfall and agile methodologies for project delivery and software development	2	1							1	
K6	The importance of effective communication and engagement with a range of stakeholders in relation to Business Analysis assignments	2				1				1	
K7	The purpose and value of quality assurance techniques	1								1	
K8	Approaches to conducting internal and external environmental analysis of an industry domain	2			1	<u> </u>	<u> </u>		1		
K9 K10	The advantages and disadvantages of a range of investigative techniques The purpose of process modelling and the importance of an organisational view of business processes	2			1		1		1		
K10	Different approaches to document business processes including when it is most appropriate to use each	2			1		 		1		
K12	Techniques to elicit requirements, including when it is most appropriate to use each	1			1					1	
K13	The importance of eliciting requirements rather than gathering solution descriptions	2				1				1	
K14	Approaches to categorise, validate and prioritise requirements	2				1				1	
K15	The importance of requirements management including change control	2							1	1	
K16 K17	A broad range of non-functional requirement areas, and the importance of including these within requirements engineering The importance of considering user experience, accessibility and usability requirements in the design of digital	2				1		1	1		
K17	solutions The value of data to an organisation, and how data needs are considered in business improvement	5	1			1		1	1	1	
K19	The purpose and activities of the gap analysis process	1			1	<u> </u>					
K20	The role of the business analyst in facilitating business acceptance of changes	1			1						
K21	The different phases of testing of business and system changes	2	1						1		
K22	The importance and the principles of engaging internal and external stakeholders	3	1						1	1	
K23	Techniques to support the identification and analysis of internal and external stakeholders	1	1						4		<u> </u>
K24	The purpose and importance of business change impact assessment The concepts of benefits realisation and management	1	1		1				1		
K25 K26	Legislation and industry standards relevant to the organisation and sector	4			1	1	 	1		1	
K27	Data protection regulations and the importance of managing information and data in line with legislation and	5	1		1	1		1		1	
	organisational policies Technology and industry trends across the digital sector, and the opportunities these bring for business	2	1						4	1	
K28	improvement and IT solutions Apply appropriate approaches to scope, plan and perform Business Analysis	3	1		1				1	1	
S1 S2	Communicate effectively in a variety of situations with a range of stakeholders	1	1		1		1		1	1	
S3	Apply a range of structured investigation techniques to a business situation	4	1			1		1	1		
S4	Produce an outline definition of a business situation using an appropriate technique	4	1		1	1			1		
S5 S6	Apply appropriate techniques to identify problems and opportunities within a business situation Support the identification and presentation of proposed actions to stakeholders to gain agreement for further	2				1			1	1	
S7	analysis activity Apply appropriate techniques to analyse and document options and recommendations for change	1				1					
S8	Elicit process information from stakeholders	3	1		1	1					
S9	Model business processes using relevant techniques, standards, notation and software tools	3			1	1			1		
S10	Analyse business process models to identify opportunities for improvement	4	1		1	1			1		
S11	Produce models of redesigned business processes	3			1	1			1		
S12	Elicit requirements from stakeholders to identify business and user needs	3	1			1				1	
S13	Document clear functional and non-functional requirements in line with local standards Analyse documented requirements to remove duplication, conflict and overlap	1				+	<u> </u>		4	1	
S14 S15	Prioritise requirements using an appropriate prioritisation approach	2	1						1	1	
S16	Validate requirements with stakeholders	3	1						1	1	
S17	Support the establishment of requirements traceability	2	1							1	
S18	Elicit business data needs from relevant sources	2	1							1	
S19	Support the development of simple data models using relevant techniques, standards, notation and software tools	1	1								
S20	Document current business situations to enable gap analysis and decision making	3	1		1	1			1		
S21	Support the development of models of future state business situations Identify key differences between current and future business situations	2			1	1			1		
S22 S23	Identify actions required to move from the current to future business situation	3	1		1				1		
S24	Define acceptance criteria for business and system changes	2	1		 			†	1		
S25	Support business acceptance of business and system changes	1		1	1	1		1			
S26	Apply relevant techniques to research and identify stakeholders	2							1	1	
S27	Analyse and document stakeholders' areas of interest and influence	2	1							1	
S28	Apply relevant techniques to research and identify stakeholders	1		<u> </u>	1	1	1	 	1		
S29 S30	Evaluate and document the key impacts on people, process, organisation, technology and information Present information and concepts in a manner appropriate to the audience	1	1			1		1	1	1	+
B1	Act logically, analytically and objectively in a range of situations	5	1			1		1	1	1	+
B2	Apply creative thinking when problem solving	4	1	 	†	1		†	1	1	+
B3	Work independently and collaboratively	4	1	1		1			1	1	
B4	Use own initiative and take responsibility appropriate to the role of Business Analyst	4	1		1	1				1	
B5	Take a thorough and organised approach and plan analysis activities in line with business priorities	5	1		1	1			1	1	
В6	Build and maintain positive working relationships with a range of people	4	1			1			1	1	
B7	Use a range of methods of communication appropriate to the situation	5	1	 	<u> </u>	1		1	1	1	$\perp \perp \perp \mid$
B8	Maintain a productive, professional and secure working environment	2		<u> </u>		1			1		
B9	Aware of the wider business environment and own contribution to business objectives Demonstrate resilience by viewing obstacles as challenges and learning from failure	3	1	<u> </u>	<u> </u>	1	1	1	1	1	+
B10 B11	Demonstrate resilience by viewing obstacles as challenges and learning from failure Tailor manner of presentation to be appropriate to the audience	4	1	-	-	1	1	1	1	1	+
B12	Work flexibly and effectively as part of a multidisciplinary team throughout the full lifecycle	3	1	†	<u> </u>	1		†	1	-	
B13	Demonstrate commitment to continuous professional development in relation to Business Analysis and the digita	3				1			1	1	
	sector			<u> </u>				<u> </u>			

NETWORK ENGINEER		Coverage 240	Computer architecture, Networks and Cyber 40	Introduction to Software Development 40	Business Systems and Data Analysis 40	Professional Practice 20	Pathway Project 20	Advanced routing, switching and troubleshooting 40	Cloud architecture 20	Virtualisation and network security 20
INETWORK ENGINEER		240	0	0	0	0	0	0	0	0
K1	the causes and consequences of network and IT infrastructure failures	3						1	1	1
K2	the architecture of typical IT systems, including hardware, OS, server, virtualisation, voice, cloud, and	4	1	1					1	1
K3	applications the techniques for systems performance and optimisation	2						1	1	1
K4	diagnostic techniques and tools to interrogate and gather information regarding systems	3						1	1	1
	performance									
K5	organizational procedures to deal with recording information effectively and in line with protocols	1						_	1	—
K6	Service Level Agreements (SLAs) and their application to delivering network engineering activities in line with contractual obligations and customer service	2						1	1	
K7	their role in Business Continuity and Disaster Recovery	2						1	1	<u> </u>
K8 K9	the purposes and uses of ports and protocols	2	1					1	 	┼
K10	devices, applications, protocols, and services at their appropriate OSI and/or TCP/IP layers the concepts and characteristics of routing and switching	2	1					1	 	+
K11	the characteristics of network topologies, types, and technologies	2	1					1		
K12	wireless technologies and configurations.	1	1						<u> </u>	
K13 K14	cloud concepts and their purposes functions of network services	2	1	-			1	1	1	
K15	the different types of network maintenance	1	1					1	+	+
K16	how current legislation relates to or impacts occupation	1			1					
K17	troubleshooting methodologies for network and IT infrastructure	1						1		
K18	how to integrate a server into a network	1							1	1
K19 K20	the types of security threats to networks and IT infrastructure assets how to use tools to automate network tasks	2							1	1
K21	approaches to change management	3			1			1	1	†
S1	apply the appropriate tools and techniques when securely operating and testing Networks	2	1							1
S2	install and configure the elements required to maintain and manage a secure Network	1	1							<u> </u>
S3	implement techniques to monitor and record systems performance in line with defined specifications	2							1	1
S4	maintain security and performance of the system against known and standard threats	2	1						1	<u> </u>
S5 S6	apply the appropriate tools and techniques to identify systems performance issues apply the appropriate tools and techniques to gather information to troubleshoot issues and isolate,	1						1	1	1
30	repair or escalate faults									
S7	communicate outcomes of tasks and record in line with organisational procedures and SLAs including	2				1		1		
	adherence to good customer service standards							_	<u> </u>	<u> </u>
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	2						1		
S9	record task details whether face-to-face, remote or in writing in line with ogranisational	3				1		1	1	+
	requirements									
S10	interpret information received from a manager, customer or technical specialist and accurately	5		1	1	1			1	1
S11	implement the defined requirements monitor, identify and implement required maintenance procedures	2							1	1
S12	implement techniques to optimise systems performance in line with defined specifications	2					1		1	+
S13	organise and prioritise clients/stakeholders' requests in line with SLAs and organization processes	1					1			
S14	explain their job role within the business context to stakeholders to enable a clear understanding on	4		1	1	1			1	
	both sides of what their remit is and convey technical constraints in appropriate language considering accessibility and diversity implications									
S15	operate securely and apply the appropriate process, policies, and legislation within their business	3			1	1			1	<u> </u>
	responsibilities								 	<u> </u>
S16	communicate with a range of stakeholders taking into consideration of organisations cultural	1				1				
S17	awareness and technical ability apply the appropriate level of responsibility when planning and prioritizing work tasks	1				1			+	+
S18	apply the relevant numerical skills (Binary, dotted decimal notation) required to meet the defines	1	1	1		<u> </u>			<u> </u>	<u> </u>
	specifications									
S19 S20	ensure compliance of network engineering outputs with change management processes	1	-	-		-		1	1	1
320	select the appropriate tools and comply with organisation policies and processes when upgrading systems	 								
B1	work independently and demonstrate initiative being resourceful when faced with a problem and	3	1					1	1	1
	taking responsibility for solving problems within their own remit					<u> </u>			<u> </u>	<u> </u>
B2 B3	work securely within the business work within the goals, vision, and values of the organisation	2			1	1			1	
B4	take a wider view of the strategic objectives of the tasks/ projects they are working on including the	4		1	1	1		1	1	+
	implications for accessibility by users and diversity									
B5	works to meet or exceed customers' requirements and expectations	3	1			1		1	<u> </u>	<u> </u>
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	3	1			$ ^1$		1		
	recurrence									
B7	Committed to continued professional development to ensure growth in professional skill and	6	1	1	1	1		1	1	
D.O.	knowledge	4	1	1		1		1	1	
B8	work effectively under pressure showing resilience	4	[1		1	11		ΙT	lΤ	Ī

K2: rol K3: the K4: ho K5: the K6: ho K7: sof K8: org K9: pri K10: pri K11: sof K12: sof S1: cre S2: de S3: linl S4: tes S5: cor	Il stages of the software development life cycle (what each stage contains, including the inputs and outputs) oles and responsibilities within the software development lifecycle (who is responsible for what) ne roles and responsibilities of the project life cycle within your organisation, and your role ow best to communicate using the different communication methods and how to adapt appropriately to ne similarities and differences between different software development methodologies, such as agile and ow teams work effectively to produce software and how to contribute appropriately	24051	40	40	40					1	
K1: all K2: rol K3: the K4: ho K5: the K6: ho K7: sof K8: org K9: pri K10: pri K11: sof S1: cre S2: de S3: linl S4: tes S5: cor	oles and responsibilities within the software development lifecycle (who is responsible for what) ne roles and responsibilities of the project life cycle within your organisation, and your role ow best to communicate using the different communication methods and how to adapt appropriately to ne similarities and differences between different software development methodologies, such as agile and ow teams work effectively to produce software and how to contribute appropriately	5	4		0	20	20	20	20	20	20
K2: rol K3: the K4: ho K5: the K6: ho K7: sof K8: org K9: pri K10: pri K11: sof K12: sof S1: cre S2: de S3: linl S4: tes S5: cor	oles and responsibilities within the software development lifecycle (who is responsible for what) ne roles and responsibilities of the project life cycle within your organisation, and your role ow best to communicate using the different communication methods and how to adapt appropriately to ne similarities and differences between different software development methodologies, such as agile and ow teams work effectively to produce software and how to contribute appropriately	1									
K3: the K4: ho K5: the K6: ho K7: sof K8: org K9: pri K10: pri K11: sof S1: cre S2: de S3: linl S4: tes S5: cor	ne roles and responsibilities of the project life cycle within your organisation, and your role ow best to communicate using the different communication methods and how to adapt appropriately to ne similarities and differences between different software development methodologies, such as agile and ow teams work effectively to produce software and how to contribute appropriately	1	1			1			1	1	1
K4: ho K5: the K6: ho K7: sof K8: org K9: pri K10: pri K11: sof K12: sof S1: cre S2: de S3: linl S4: tes S5: cor	ow best to communicate using the different communication methods and how to adapt appropriately to ne similarities and differences between different software development methodologies, such as agile and ow teams work effectively to produce software and how to contribute appropriately	11				1				<u> </u>	
K5: the K6: ho K7: sof K8: org K9: pri K10: pri K11: sof K12: sof S1: cre S2: de S3: linl S4: tes S5: cor	ne similarities and differences between different software development methodologies, such as agile and ow teams work effectively to produce software and how to contribute appropriately	1				1					
K6: ho K7: sof K8: org K9: pri K10: pri K11: sof K12: sof S1: cre S2: dev S3: linl S4: tes S5: cor	ow teams work effectively to produce software and how to contribute appropriately	1				1			4	1	
K7: sof K8: org K9: pri K10: pri K11: sof K12: sof S1: cre S2: de S3: linl S4: tes S5: cor		5	1			1			1	1	1
K8: org K9: pri K10: pri K11: sof K12: sof S1: cre S2: dev S3: linl S4: tes S5: cor		1				1			4	<u> </u>	
K9: pri K10: pri K11: sof K12: sof S1: cre S2: de S3: linl S4: tes S5: cor	oftware design approaches and patterns, to identify reusable solutions to commonly occurring problems	5	1	1		1		1	1	1	1
K10: pri K11: sof K12: sof S1: cre S2: de S3: linl S4: tes S5: cor	rganisational policies and procedures relating to the tasks being undertaken, and when to follow them. For	<u> </u>	1	1		1	-	1	1	1	1
K11: sof K12: sof S1: cre S2: dev S3: linl S4: tes S5: cor	rinciples of algorithms, logic and data structures relevant to software development for example:Arrays,	3	1		1		+	 	1	1	1
K12: sof S1: cre S2: de S3: linl S4: tes S5: cor	rinciples and uses of relational and non-relational databases	6	1		1	1	+	1	1	1	1
S1: cre S2: dev S3: linl S4: tes S5: cor	oftware designs and functional/technical specifications oftware testing frameworks and methodologies	4	T			1	+	1	1	<u> </u>	1
S2: det S3: linl S4: tes S5: cor	reate logical and maintainable codes	4	1			1	+	1	1	1	1
S3: linl S4: tes S5: cor	evelop effective user interfaces	1	1			1	+		1	1	1
S4: tes S5: cor	nk code to data sets	4	I			1	+	1	1	1	1
S5: cor	est code and analyse results to correct errors found using unit testing	1	1			1	+	1		1	1
	onduct a range of test types, such as Integration, System, User Acceptance, Non-Functional, Performance and	4	1			1	+	 	1	 	1
S6: ide	dentify and create test scenarios	5	1			1	+	1	1		1
	pply structured techniques to problem solving, can debug code and can understand the structure of	5	1			1	+	1	1	1	1
	reate simple software designs to effectively communicate understanding of the program	6	1			1	+	1	1	1	1
	reate analysis artefacts, such as use cases and/or user stories	1				1	+	 		<u>†</u>	
	uild, manage and deploy code into the relevant environment	6	1			1	+	1	1	1	1
	pply an appropriate software development approach according to the relevant paradigm (for example object	5	1			1	+	1	1	1	1
	ollow software designs and functional/technical specifications	4	_			1		1	1	1	
	ollow testing frameworks and methodologies	3						1	1		1
	ollow company, team or client approaches to continuous integration, version and source control	1				1		_	_		_
	ommunicate software solutions and ideas to technical and non-technical stakeholders	3				1				1	1
	pply algorithms, logic and data structures	6	1		1			1	1	1	1
	nterpret and implement a given design whist remaining compliant with security and maintainability	5		1		1		1		1	1
	Vorks independently and takes responsibility. For example, has a disciplined and responsible approach to risk,	5	1			1		1		1	1
	pplies logical thinking. For example, uses clear and valid reasoning when making decisions related to	6	1		1			1	1	1	1
	Naintains a productive, professional and secure working environment	3		1		1					1
	Vorks collaboratively with a wide range of people in different roles, internally and externally, with a positive	1				1					
	cts with integrity with respect to ethical, legal and regulatory ensuring the protection of personal data, safety	2		1		1					
	hows initiative for solving problems within their own remit, being resourceful when faced with a problem to	5	1			1			1	1	1
	ommunicates effectively in a variety of situations to both a technical and nontechnical audience.	2				1					1
	hows curiosity to the business context in which the solution will be used, displaying an inquisitive approach	2		1		1					
	emonstrates creativity and tenacity in their approach to solutions and the methods used to come to a	5	1			1			1	1	1
B10: Co	ommitted to continued professional development.	6		1	1			1	1	1	1
		0									
		0									
		0								Ī	
		0									
		T	<u> </u>								
		0									

		Coverage	Introduction to Software Development	Computer architecture, Networks and Cyber	Business Systems and Data Analysis	Professional Practice	Pathway Project	API Development	Web Development	Test Automation	Managing Software Testing
Software		240	40	40	40	20	20	20	20	20	20
Tester											
K1:	the relationship between testing and quality assurance and how testing contributes to higher quality	4			1			1		1	1
K2:	the difference between error, defect, and failure including the distinction between the root cause of a defect	3			1					1	1
K3:	the impact of context on the test process including the activities, tasks and work products that support the	2					-			1	1
K4:	the need for traceability between the requirements/test basis and the test work products	2					<u> </u>			1	1
K5:	the principles underpinning the psychology of testing including how the required mindset differs from the	1				-	1			<u> </u>	1
K6:	the importance of accuracy and clear documentation of software tests and defects.	3					1	1		1	1
K7:	the relationship between test activities and software development activities in the Software Development Life	5				1	1	1	1	1	1
K8:	the application of testing across different recognised software development methodologies (sequential and	3					1	1		1	1
K9:	the range and features of software test types within the broad categories of Functional, Non-Functional,	2				-	1			1	1
K10:	the objectives and approaches for testing at different Test Levels (such as Unit Testing, Component	3		-	1		<u> </u>	1		1	
K11:	the role of static testing techniques and the review process in early defect detection	4		-			<u> </u>	1	1	1	1
K12:	the characteristics of Black Box, White Box and Experience-based Test Techniques	3						1		1	1
K13:	the application of common Black Box Techniques to derive test conditions and test cases (Equivalence	2		-			<u> </u>	1			1
K14:	the role of software testing within the context of project and product risk reduction in the systems	1								1	
K15:	the defect management process	1								1	
K16:	the typical metrics used to support the monitoring and control of testing	2						1		1	
K17:	the classification of tools to support testing	1					1			1	
K18:	the role of test automation in the context of the software development lifecycle	2					1	1		1	
K19:	the need for conformance to specific industry standards where appropriate (such as GDPR, health	5			1	1	1	1		1	1
K20:	where Software Testers fit within the wider team and the roles and responsibilities that others play.	4	1		1	1	ļ			<u> </u>	1
K21:	the characteristics of software architecture that impact on software testing in the development lifecycle	6	1		1	1	1	1		1	1
K22:	the core testing behaviours, skills and tools that are common to developers, testers, and multi-skilled roles in	4			1	1	ļ	1		<u> </u>	1
K23:	the typical security vulnerabilities that should be addressed by testing in general and specifically by	3		1	1					1	
S1:	apply static test techniques	2								1	1
S2:	apply Black Box test techniques such as Equivalence Partitioning, Boundary Value Analysis, Decision Table	2								1	1
S3:	analyse test objectives and requirements/test basis to define test scope and coverage criteria	5			1	1		1		1	1
S4:	use tools to automate, manage or support any test activity.	3						1		1	1
S5:	Apply a regression strategy including selection of tests, maintenance of regression suites and identifying tests	1								1	
S6:	use defect tracking tools	2						1		1	
S7:	adapt and apply testing activities according to industry standard development methodologies (sequential and	6	1	1				1	1	1	1
S8:	apply the range of different software test types within the broad categories of Functional, Non-Functional	3			1					1	1
S9:	apply and support testing at different Test Levels appropriate to the Software Development Lifecycle (such as	6	1		1			1	1	1	1
S10:	conform to specific industry standards where appropriate (such as GDPR, health informatics, safety critical,	4		1		1				1	1
S11:	maintain up to date knowledge of technological developments in the field of Software Testing	3						1		1	1
S12:	record and interpret test progress and results, communicating test status to the relevant stakeholders.	3	1							1	1
S13:	Design and follow tests to achieve coverage criteria	5	1		1			1		1	1
B1:	maintains a productive, professional, and secure working environment	3			1	1					1
B2:	Works independently and takes responsibility. For example, disciplined and responsible approach to risk,	4	1	1		1					1
B3:	A problem solving mindset within their own remit, being inquisitive and resourceful when faced with a	6		1		1		1	1	1	1
B4:	Applies logical thinking, for example, uses clear and valid reasoning when making decisions related to	3		1	1	1					
B5:	analytical - uses informal and formal techniques to deconstruct a scenario or test basis to identify tests that	7	1	1	1	1		1	1		1
B6:	Works collaboratively with a wide range of people in different roles, internally and externally, with a positive	2				1					1
B7:	Communicates effectively in a wide variety of situations; for example, contributing effectively to meetings	2				1	ĺ				1

		Coverage	Introduction to Software Development	architecture, Networks and Cyber	ss Systems ta Analysis	Professional Practice	Pathway Project	Web Development	Accessibility and User Expereience	Interface Design and Testing	Web Frameworks
Digital Accessibility		240	40	40	40	20	20	20	20	20	20
K1:	The characteristics and categories of disabilities (including temporary, situational and permanent disabilities)	1								1	\Box
K2:	Commonly used accessibility guidelines (for example the Web Content Accessibility Guidelines, EN301549 and	4	1					1	1	1	
K3:	How accessibility is managed and integrated within an enterprise environment including policies, and	2			1				1		
K4:	How to utilise productivity suites ensuring output is accessible and advising on the implementation of	4	1					1		1	1
K5:	The implications and effect on users with disabilities, and UK businesses of international disability legislation	2	1					1			
K6:	How to present using relevant technologies and aids in a manner that communicates the information (including	1				1					
K7:	The process to set-up, moderate and conduct activities relating to hosting workshops including moderation	1					1				
K8:	The basics of Hyper Text Mark-up Language, Cascading Style Sheets, JavaScript and Accessibility Rich Internet	4	1					1		1	1
K9:	How mobile applications are developed using appropriate development applications and the basics of the	3	1		1						1
K10:	The fundamentals of the Web Content Accessibility Guidelines (WCAG), including the purpose, application and	5	1					1	1	1	1
K11:	The basic principles of project management (including project life cycle methodologies), and how accessibility	3			1	1	1				
K12:	The accessibility considerations when designing and developing an application's user experience using related	5	1					1	1	1	1
K13:	How to use assistive technologies (both digital and physical), their use-cases and functionality, degrees of	2							1	1	
K14:	How assistive technologies interact with other digital technologies.	3		1	1				1		
K15:	The principles and application of testing methodologies to accessibility criteria and assistive technologies, and	4		1				1	1	1	
K16:	How to construct a business report (for example document layout and contents).	3			1	1	1				
K17:	The purpose and importance of reasonable adjustments, and how these are managed.	2					1		1		
K18:	Best practices regarding digital security including General Data Protection Regulations 2018, how these are	3		1	1	1					
K19:	The security considerations relating to the installation and utilisation of assistive technologies, how these tools	1		1							
K20:	How to communicate through different mediums, including tailoring communications to different user groups.	4				1	1		1	1	
K21:	How to use incident management tools, triage incidents and appropriately communicate with assistive	1		1							
K22:	How to audit digital applications (including web and mobile applications) against digital assistive technologies	4		1				1	1	1	
K23:	The preparation and processes required to conduct training with a variety of user groups for example project	2		1					1		
K24:	How accessibility fits into the wider digital landscape, including current/future applicable regulatory	5		1		1			1	1	1
K25:	How to use data ethically and the implications for wider society, with respect to the use of data, automation	4		1	1	1	1				
S1:	Present information, (for example business cases, testing findings, general information etc.) to a variety of	3			1	1	1				
S2:	Use hardware and software based assistive technologies for a variety of applications (for example testing,	4		1			1		1	1	
S3:	Use Interpersonal skills to develop and maintain effective and credible professional relationships both within	3		1		1	1				
S4:	Conduct testing against a variety of platforms using appropriate standards and/or guidelines and assistive	5		1			1	1	1	1	
S5:	Conduct workshops, surveys or focus groups, including the set-up, running and conclusion activities.	3				1	1			1	
S6:	Both written and verbal communication skills when working as a team or individually.	4		1		1		1		1	
S7:	Solve problems using a logical and analytical approach.	5	1	1	1	1		1			
S8:	Identify appropriate assistive technologies and adaptive strategies for an individual's disability.	2	1							1	
S9:	Practice disability etiquette, when communicating with individuals with disabilities.	3					1		1	1	
S10:	Apply accessibility standards and regulations to practice.	4						1	1	1	1
S11:	Uses productivities suites and implementing accessibility best practices (for example reading level, colour	4						1	1	1	1
S12:	Create business reports, business cases and documentation appropriate for the target audience (for example	3			1	1	1				
S13:	Identifies and rectify issues being experienced using appropriate troubleshooting methods relating to a user's	2							1	1	
S14:	Apply security best practices.	6		1	1			1	1	1	1
S15:	Apply accessibility guidelines (for example WCAG, ISO9241 Ergonomics of human-system interaction) when	5				1	1	1	1	1	\perp
S16:	Collate and research information, or statistics (for example disability statistics, appropriate assistive technology	3			1		1			1	\perp
S17:	Keep up-to-date with developments in technologies, trends and innovation using a range of sources.	7		1	1	1	<u> </u>	1	1	1	1
S18:	Lead a group of individuals using basic leadership skills as to achieve a common goal.	1				1	<u> </u>				
B1:	Motivated, empathetic and driven in the field of accessibility and the wider digital sphere.	4		1		1			1	1	\perp
B2:	Proactively Inclusive.	3				1			1	1	
B3:	Manages time effectively and adheres to timescales when producing work product.	3	1			1	1				
B4:	Inquisitive, innovative and forward-thinking regarding digital technologies which could have beneficial	3					1		1	1	