MODULE DESCRIPTION FORM

نموذج وصف المادة الدراسية

Module Information معلومات المادة الدراسية					
Module Title	Computer Application In Business			Module Delivery	
Module Type	Core			☒ Theory ☒ Lecture ☒ Lab ☐ Tutorial ☒ Practical ☐ Seminar	
Module Code	CSIT0107				
ECTS Credits	7				
SWL (hr/sem)					
Module Level	1	Semester of Delivery	1		
Administering Department	CIS	College	CSIS		
Module Leader	Wed Akeel Jawad	e-mail	wid.jawad@uobasrah.edu.iq		
Module Leader's Acad. Title	Assist Professor	Module Leader's Qualification	Master		
Module Tutor	Name (if available)	e-mail	E-mail		
Peer Reviewer Name	Name	e-mail	E-mail		
Scientific Committee Approval Date	01/02/2024	Version Number	1.0		

Relation with other Modules العلاقة مع المواد الدراسية الأخرى			
Prerequisite module	Computer skills	Semester	1
Co-requisites module	None	Semester	

Module Aims, Learning Outcomes and Indicative Contents أهداف المادة الدراسية ونتائج التعلم والمحتويات الإرشادية	
Module Objectives أهداف المادة الدراسية	1. Plan, create, modify, and presented spreadsheets 2. Organize, edit, and enhance data in spreadsheets to achieve business standards, and recognize and resolve many types of errors. 3. Use formulas and built-in functions appropriately and correctly to solve problems and critically assess the results 4. Learn the logical function to solve the selection problems. Logical functions use to compare values and give logical results only (True, False) 5. Learn the Statistical functions, The functions in this category perform statistical analysis on ranges of data, like average, count, countIf, Mean, etc. 6. Learn Math functions, This category contains a wide variety of functions that perform mathematical and trigonometric calculations like, sum, sumif , round, etc. 7. Learn the information functions, Each of these functions, referred to collectively as the information functions, checks the specified value and returns TRUE or FALSE depending on the outcome.like , ISBLANK , ISERROR , ISTEXT,..etc. 8. Learn the text function, The functions in this category perform very important processes to the textual information, like, search, mid, replace, find, left,..etc. 9. Learn Lookup and Reference Functions, Functions in this category are used to find (look up) values in lists or tables. A common example is a tax table. You can use the VLOOKUP function to determine a tax rate for a particular income level. 10. Learn Date and time functions, Functions in this category are used to deal with date and time values like, today, date, now, datedif, ..etc. 11. Plan, organize, create, and present spreadsheet data in graphic form, Microsoft Office Excel supports numerous types of charts to help you display data in ways that are meaningful to your audience. When you want to create a chart or change an existing chart, you can choose from a wide range of chart subtypes available for each of the following chart types. 12. Learn some Advanced Tools, like, Tables, Conditional format, Data validation, and What-If Analysis
Module Learning Outcomes مخرجات التعلم للمادة الدراسية	1- Give the student the most important skills to become an Excel **power users** have a broad understanding of Excel's functionality and they know which tool or function is best used in a given situation. Power users create complex workbooks for their use and are often called on to help develop workbooks for their colleagues, or to identify why their colleagues' workbooks don't work as intended.

	2- Learn the most important skills to deal with worksheets and workbooks. 3- Learn how to deal with and solve formula errors. 4- Learn how to write and use the most important functions in many categories. 5- Learn how to use chart graphical representation to analyze the data. 6- Learn additional advanced skills and tools like tables, data validation, and other tools to enhance the student's ability level.
Indicative Contents المحتويات الإرشادية	Indicative content includes the following. - Principles of electronic Worksheet creation and formatting, entering of data, formulas, error handling, and type of operators. - Functions Logical, statistical, math, text, lookup, and reference functions and data and time function - Graphical reprsentions Column, line, Bar, Area, and many other types - Advance tool Tables, conditional format, data validation, and what-if analyses

Learning and Teaching Strategies استراتيجيات التعلم والتعليم	
Strategies	The main strategy that will be adopted in delivering this module is to encourage students' participation in the exercises, while at the same time refining and expanding their critical thinking skills. This will be achieved through classes and the lab, interactive tutorials, and by considering types of simple experiments involving some sampling activities that are interesting to the students.

Student Workload (SWL) الحمل الدراسي للطالب محسوب لـ ١٥ اسبوعا			
Structured SWL (h/sem) الحمل الدراسي المنتظم للطالب خلال الفصل	62	**Structured SWL (h/w)** الحمل الدراسي المنتظم للطالب أسبوعيا	4
Unstructured SWL (h/sem) الحمل الدراسي غير المنتظم للطالب خلال الفصل	113	**Unstructured SWL (h/w)** الحمل الدراسي غير المنتظم للطالب أسبوعيا	7.5
Total SWL (h/sem) الحمل الدراسي الكلي للطالب خلال الفصل	**175**		

Module Evaluation

تقييم المادة الدراسية

		Time/Number	Weight (Marks)	Week Due	Relevant Learning Outcome
Formative assessment	Quizzes	2	10% (10)	5 and 10	LO #1, #2 and #10, #11
	Assignments	2	10% (10)	2 and 12	LO #3, #4 and #6, #7
	Projects / Lab.	1	10% (10)	Continuous	All
	Report	1	10% (10)	13	LO #5, #8 and #10
Summative assessment	Midterm Exam	2hr	10% (10)	7	LO #1 - #7
	Final Exam	3hr	50% (50)	16	All
Total assessment			100% (100 Marks)		

Delivery Plan (Weekly Syllabus)

المنهاج الاسبوعي النظري

	Material Covered
Week 1	General introduction about how to handle worksheets and workbooks and Worksheet creation and formatting, entering of data, formulas, types of operators, and error solving
Week 2	Logical functions
Week 3	Statistical functions
Week 4	Statistical functions
Week 5	Math functions
Week 6	Information functions
Week 7	Mid-term Exam + lab exam
Week 8	Lookup and reference function
Week 9	Lookup and reference function
Week 10	Text function
Week 11	Text function
Week 12	Date and time function
Week 13	Date and time function
Week 14	Basic chart
Week 15	Advanced tools

Week 16	**Preparatory week before the final Exam**

Delivery Plan (Weekly Lab. Syllabus) المنهاج الاسبوعي للمختبر	
	Material Covered
Week 1	Lab 1: Worksheet creation and formatting; entering of data
Week 2	Lab 2: execute many examples of logical functions and make weakly practice exam
Week 3	Lab 3: execute many examples of statistical functions
Week 4	Lab 4: execute many examples of statistical functions and make weakly practice exam
Week 5	Lab 5: execute many examples of math functions and make weakly practice exam
Week 6	Lab 6: execute many examples of information functions and make weakly practice exam
Week 7	Lab 7: mid term lab exam
Week 8	Lab 8: execute many examples of lookup and reference functions and make weakly practice exam
Week 9	Lab9: execute many examples of lookup and reference functions and make weakly practice exam
Week 10	Lab 10: execute many examples of text functions
Week 11	Lab 11: execute many examples of text functions and make weakly practice exam
Week 12	Lab 12: execute many examples of date and time functions
Week 13	Lab 13:execute many examples of date and time functions and make weakly practice exam
Week 14	Lab 14:execute many examples of the basic chart
Week 15	Lab15: execute many examples of advanced tools

Learning and Teaching Resources مصادر التعلم والتدريس		
	Text	**Available in the Library?**
Required Texts	Excel Data Analysis, Modeling and Simulation, Second Edition, Hector GuerreroCollege of William & Mary,Mason School of Business ,Williamsburg, VA, USA,2019	Yes
Recommended Texts	اكسل 2019 ، الدليل السهل ، 2019 ، نضال الشامي	Yes
Websites	Excel VBA Tutorial - Easy Excel Programming (excel-easy.com)	

Grading Scheme مخطط الدرجات

Group	Grade	التقدير	Marks %	Definition
Success Group (50 - 100)	**A** - Excellent	امتياز	90 - 100	Outstanding Performance
	B - Very Good	جيد جدا	80 - 89	Above average with some errors
	C - Good	جيد	70 - 79	Sound work with notable errors
	D - Satisfactory	متوسط	60 - 69	Fair but with major shortcomings
	E - Sufficient	مقبول	50 - 59	Work meets minimum criteria
Fail Group (0 – 49)	**FX** – Fail	راسب (قيد المعالجة)	(45-49)	More work required but credit awarded
	F – Fail	راسب	(0-44)	Considerable amount of work required

Note: Marks Decimal places above or below 0.5 will be rounded to the higher or lower full mark (for example a mark of 54.5 will be rounded to 55, whereas a mark of 54.4 will be rounded to 54. The University has a policy NOT to condone "near-pass fails" so the only adjustment to marks awarded by the original marker(s) will be the automatic rounding outlined above.

MODULE DESCRIPTION FORM

نموذج وصف المادة الدراسية

Module Information معلومات المادة الدراسية					
Module Title	Computer Skills			Module Delivery	
Module Type	Core			☒ Theory ☒ Lecture ☒ Lab ☐ Tutorial ☒ Practical ☐ Seminar	
Module Code	CSITCIS102				
ECTS Credits	7				
SWL (hr/sem)	175				
Module Level	1		Semester of Delivery	1	
Administering Department	CIS		College	CSIT	
Module Leader	Marwah Kamil Hussein		e-mail	Marwa.hussein@uobasrah.edu.iq	
Module Leader's Acad. Title	Lecturer		Module Leader's Qualification	MSc.	
Module Tutor	Name (if available)		e-mail		
Peer Reviewer Name			e-mail		
Scientific Committee Approval Date	16/09/2024		Version Number	1.0	

Relation with other Modules العلاقة مع المواد الدراسية الأخرى			
Prerequisite module		Semester	
Co-requisites module		Semester	

Module Aims, Learning Outcomes and Indicative Contents أهداف المادة الدراسية ونتائج التعلم والمحتويات الإرشادية	
Module Objectives أهداف المادة الدراسية	1. Computer basics, components and applications. 2. Different types of computers. 3. The concept of the internet and its applications (e-mail, browsers). 4. Professional document creation, editing and printing. 5. Electronic spreadsheets and how to use them to perform calculations. 6. The appropriate design and display of digital presentations. 7. How to search for information using different sources 8. How to design and develop applications using simple software.
Module Learning Outcomes مخرجات التعلم للمادة الدراسية	1. Demonstrate knowledge of basic concepts of hardware, software, network, internet and clouds. 2. Manage files, folders and user accounts efficiently. 3. Develop well designed documents, workbooks and databases using MS Office. 4. Apply IT tools to collect, analyze, evaluate and report data.
Indicative Contents المحتويات الإرشادية	1. Introduction to the computer - Basic components of a computer (monitor, CPU, storage, etc.) - Keyboard vs. mouse - Desktop vs. laptop - Activity: power off/on computers 2. Introduction to Windows - Desktop (icons, Start button, taskbar) - Cursor/mouse - Activity: click & drag desktop icons - Programs (3 ways to start programs: icon, Start, All Programs) 3. Typing 4. Windows Navigation - Window features (minimize, resize, exit, click & drag) - Menu bar (drop-down arrow) - Tool bar (icons) (roll cursor over to ID) - Scrolling - Multiple ways to do the same thing (menu, icon, keyboard) 5. Word - How to open Word (icon, Start menu, All Programs) - What is a "document" - Using the cursor with text (how to position, different types of cursor) - Review menu bar and tool bar - Using the keyboard with text (arrows, backspace, delete, tab, shift, space, enter keys) - Highlighting text (click & drag, full line from margin, edit/select all) - Requirement to highlight text for formatting commands - Formatting commands (Bold/Italicize/Underline, show as "on/off" icons) - Font size, Font type (review drop-down arrow)

	- Text color, Text highlight (review drop-down arrow) - Alignment (left, center, right) - Undo/Redo - Spell check (by the word, by the document) - Find/replace - Bullets/numbers - Review Windows Navigation (lesson 6) - Copy/cut/paste 6. Excel - Introduction to Excel (cells, row, column) - Tables - Basic Excel formulas 7. Windows File Management - Options for storage (internal drive, flash drive, CD/DVD) - Introduce Flash Drive - Files and Folders - My Computer - Save As, Save and Exit without changes 8. Internet Navigation - What is the Internet - What is a Web Browser - Links and navigation bars - Back & forward arrow buttons, home button - Address bar (how to use the website address/URL in the address bar) 9. Internet Search - How to start a web browser (Mozilla Firefox or Internet Explorer) - Getting to Google (toolbars, search box, other Google features) - Job search 10. EMAIL - Open new email - Send emails (attachment, text...)

Learning and Teaching Strategies استراتيجيات التعلم والتعليم	
Strategies	The primary approach for delivering this module will focus on fostering active student engagement in exercises, while simultaneously enhancing their critical thinking abilities. This will be accomplished through a combination of classroom and laboratory sessions, interactive tutorials, and the incorporation of captivating sampling activities to facilitate hands-on learning experiences for the students.

Student Workload (SWL) الحمل الدراسي للطالب محسوب لـ ١٥ أسبوعا			
Structured SWL (h/sem) الحمل الدراسي المنتظم للطالب خلال الفصل	62	**Structured SWL (h/w)** الحمل الدراسي المنتظم للطالب أسبوعيا	4
Unstructured SWL (h/sem) الحمل الدراسي غير المنتظم للطالب خلال الفصل	113	**Unstructured SWL (h/w)** الحمل الدراسي غير المنتظم للطالب أسبوعيا	6
Total SWL (h/sem) الحمل الدراسي الكلي للطالب خلال الفصل	175		

Module Evaluation تقييم المادة الدراسية					
		Time/Number	**Weight (Marks)**	**Week Due**	**Relevant Learning Outcome**
Formative assessment	**Quizzes**	2	10% (10)	5 and 10	LO #1, #2 and #10, #11
	Assignments	2	10% (10)	2 and 12	LO #3, #4 and #6, #7
	Projects / Lab.	1	10% (10)	Continuous	All
	Report	1	10% (10)	13	LO #5, #8 and #10
Summative assessment	**Midterm Exam**	2hr	10% (10)	7	LO #1 - #7
	Final Exam	3hr	50% (50)	16	All
Total assessment			100% (100 Marks)		

Delivery Plan (Weekly Syllabus) المنهاج الاسبوعي النظري	
	Material Covered
Week 1	✓ Using the Computer and Managing Files • Operating System • File Management • Utilities • Print Management
Week 2	✓ Word Processing • Using the Application • Document Creation • Formatting
Week 3	✓ Word Processing

	• Objects • Mail Merge • Prepare Outputs
Week 4	✓ Word Processing • Referencing • Enhancing Productivity • Collaborative Editing
Week 5	✓ Spreadsheets • Using the Application • Cells • Managing Worksheets • Formulas and Functions
Week 6	✓ Spreadsheets • Formatting • Charts • Prepare Outputs • Analysis
Week 7	✓ Spreadsheets • Validating and Auditing • Enhancing Productivity • Collaborative Editing
Week 8	Mid-term Exam
Week 9	✓ Presentation • Using the Application • Developing a Presentation • Text • Charts and Diagrams
Week 10	✓ Presentation • Graphical Objects • Prepare Outputs • Presentation Planning • Slide Masters and Templates
Week 11	✓ Presentation • Multimedia • Enhancing Productivity • Managing Presentations
Week 12	✓ Online Essentials • Web Browsing Concepts • Web Browsing
Week 13	✓ Online Essentials • Web-Based Information • Communication Concepts • Using E-mail
Week 14	✓ Visio • Using the Application • Creating Technical Layouts

Week 15	✓ Visio • Exploring Advanced Diagrams • Diagramming and Data • Advanced Custom Shape Design

Delivery Plan (Weekly Lab. Syllabus) المنهاج الاسبوعي للمختبر	
	Material Covered
Week 1	1. Operating System: • Familiarization with the chosen operating system • Navigating through the desktop, taskbar, and start menu 2. File Management: • Creating, renaming, copying, moving, and deleting files and folders • Sorting and organizing files based on different criteria 3. Utilities: • Exploring system utilities for maintenance tasks • Performing basic optimization tasks for computer performance 4. Print Management: • Setting up and configuring printers • Printing documents and adjusting print settings
Week 2	1. Using the Application: • Opening the word processing application • Exploring the user interface and menus 2. Document Creation: • Creating and saving a new document • Opening an existing document 3. Formatting: • Applying font styles, sizes, and colors • Adjusting paragraph alignment • Adding bullet points or numbering • Applying basic text formatting (bold, italic, underline)
Week 3	1. Objects: • Inserting and formatting images and shapes • Adjusting object size and position • Applying borders and shading 2. Mail Merge: • Creating a data source with recipient information • Designing a template with placeholders • Performing a mail merge to generate personalized documents • Previewing and editing merged documents 3. Prepare Outputs: • Formatting documents for printing • Setting up headers, footers, and page numbers • Adding tables of contents or indexes • Creating PDF or electronic document formats
Week 4	1. Referencing: • Adding citations and creating a bibliography • Inserting footnotes or endnotes 2. Enhancing Productivity: • Using shortcuts and keyboard commands for faster editing • Customizing the user interface and toolbar 3. Collaborative Editing:

	• Enabling track changes and reviewing document revisions • Inserting comments and resolving conflicts
Week 5	1. Using the Application: • Navigating the spreadsheet application • Exploring different toolbars and options 2. Cells: • Entering and formatting data in cells • Adjusting cell alignment and text wrapping 3. Managing Worksheets: • Creating, renaming, and deleting worksheets • Moving and copying worksheets 4. Formulas and Functions: • Writing basic formulas for calculations • Using common functions (e.g., sum, average, count) • Referencing cells in formulas
Week 6	1. Formatting: • Formatting cell content • Applying conditional formatting 2. Charts: • Creating charts • Customizing chart elements 3. Prepare Outputs: • Setting up print areas • Saving and sharing spreadsheets 4. Analysis: • Using functions for data analysis • Sorting and filtering data
Week 7	1. Validating and Auditing: • Setting data validation rules • Auditing formulas for errors 2. Enhancing Productivity: • Using shortcuts for efficient navigation • Utilizing autofill and templates 3. Collaborative Editing: • Tracking changes by multiple users • Inserting comments
Week8	Lab Exam
Week9	1. Using the Application: • Navigating the presentation application • Exploring different toolbars and options 2. Developing a Presentation: • Creating slides and selecting layouts • Adding and arranging content (text, images, shapes) • Applying themes and customizing backgrounds 3. Text: • Formatting text (font, size, color) • Aligning and spacing text on slides 4. Charts: • Inserting and formatting charts • Adding labels and titles to charts
Week10	1. Graphical Objects: • Inserting and manipulating graphical objects • Applying effects and styles to graphics • Arranging and aligning graphical objects on slides 2. Prepare Outputs:

	• Setting up slide layouts and design elements • Configuring slide transitions and animations 3. Presentation Planning: • Outlining the structure and content of the presentation • Determining key messages and visuals for each slide 4. Slide Masters and Templates: • Modifying slide masters for consistent design • Creating and applying slide templates
Week11	1. Multimedia: • Inserting and managing multimedia elements (videos, audio, animations) • Configuring playback settings for multimedia • Syncing multimedia with slide transitions 2. Enhancing Productivity: • Utilizing shortcuts and productivity features • Using slide layouts and templates • Applying design themes for visual appeal 3. Managing Presentations: • Organizing and managing slides • Rearranging slide order • Configuring slide show settings
Week12	1. Web Browsing Concepts: • Understanding the basics of web browsing • Exploring different web browsers and their features • Learning about search engines and their functionalities 2. Web Browsing: • Opening a web browser and navigating to websites • Using bookmarks and favourites to save and access web pages • Exploring tabs and managing multiple web pages
Week13	1. Web-Based Information: • Searching and accessing information from websites • Evaluating online source reliability • Bookmarking useful websites 2. Communication Concepts: • Understanding online communication forms • Practicing netiquette and online etiquette • Recognizing online communication risks 3. Using E-mail: • Composing and sending emails • Managing email folders • Attaching files and formatting emails
Week14	1. Using the Application: • Opening and navigating the Visio application • Exploring the user interface and toolbars • Familiarizing with various Visio features and options 2. Creating Technical Layouts: • Creating and arranging shapes on a drawing canvas • Adding connectors and lines to create flowcharts or diagrams Applying formatting and styles to enhance the visual appearance
Week15	1. Exploring Advanced Diagrams: • Creating complex diagrams with advanced shapes and connectors • Using templates and stencils for specific diagram types • Incorporating advanced features like layers and callouts 2. Diagramming and Data: • Importing and linking external data to create data-driven diagrams • Customizing data visuals and applying data graphics

	• Creating organizational charts or network diagrams with data connectivity 3. Advanced Custom Shape Design: • Creating and modifying custom shapes using shape creation tools • Enhancing existing shapes to meet specific requirements • Utilizing shape behaviours and metadata for enhanced functionality

Learning and Teaching Resources
مصادر التعلم والتدريس

	Text	Available in the Library?
Required Texts	**Microsoft Office 2013** Visual Quickstart Guide*by Steve Schwartz*	
Recommended Texts	Gary B. Shelly, Misty E. Vermaat (2010). Microsoft Office 2010: Brief. Cengage Learning. OR any ECDL, ICDL or IC3 books	
Websites	https://www.microsoft.com	

Grading Scheme
مخطط الدرجات

Group	Grade	التقدير	Marks %	Definition
Success Group (50 - 100)	**A -** Excellent	امتياز	90 - 100	Outstanding Performance
	B - Very Good	جيد جدا	80 - 89	Above average with some errors
	C - Good	جيد	70 - 79	Sound work with notable errors
	D - Satisfactory	متوسط	60 - 69	Fair but with major shortcomings
	E - Sufficient	مقبول	50 - 59	Work meets minimum criteria
Fail Group (0 – 49)	**FX –** Fail	راسب (قيد المعالجة)	(45-49)	More work required but credit awarded
	F – Fail	راسب	(0-44)	Considerable amount of work required

Note: Marks Decimal places above or below 0.5 will be rounded to the higher or lower full mark (for example a mark of 54.5 will be rounded to 55, whereas a mark of 54.4 will be rounded to 54. The University has a policy NOT to condone "near-pass fails" so the only adjustment to marks awarded by the original marker(s) will be the automatic rounding outlined above.

MODULE DESCRIPTION FORM

نموذج وصف المادة الدراسية

Module Information معلومات المادة الدراسية					
Module Title	Discrete Structures			Module Delivery	
Module Type	Core			☒ Theory ☒ Lecture ☒ Lab ☐ Tutorial ☐ Practical ☐ Seminar	
Module Code	CSITCIS108				
ECTS Credits	76				
SWL (hr/sem)	175				
Module Level	1		Semester of Delivery	2	
Administering Department	Type Dept. Code		College	Type College Code	
Module Leader	Zahra Salman Bloshi		e-mail	zahraa.csit@avicenna.uobasrah.edu.iq	
Module Leader's Acad. Title	Assistant teacher		Module Leader's Qualification	Ph.D.	
Module Tutor	Name (if available)		e-mail	E-mail	
Peer Reviewer Name	Name		e-mail	E-mail	
Scientific Committee Approval Date	01/06/2023		Version Number	1.0	

Relation with other Modules العلاقة مع المواد الدراسية الأخرى			
Prerequisite module	None	Semester	
Co-requisites module	None	Semester	

Module Aims, Learning Outcomes and Indicative Contents أهداف المادة الدراسية ونتائج التعلم والمحتويات الإرشادية	
Module Objectives أهداف المادة الدراسية	This course aims at teaching students how to think mathematically. Students will learn a set of mathematical facts and techniques as well as some major discrete structures that related with computers. They will also learn how to use these facts, techniques and discrete structures to design computer-based solutions for real life problems.
Module Learning Outcomes مخرجات التعلم للمادة الدراسية	• Developing the acquisition of some acquired skills from inflammation Everyday life. • Developing mathematical skills (skills that help form mathematical sense) skills Estimation, mental calculation, judging the reasonableness of the results, etc.). • Acquiring various methods of conducting operations. • Develop the ability to seriously classify and collect numerous data, tabulate and read them representation and interpretation. •
Indicative Contents المحتويات الإرشادية	✓ Self-learning skills ✓ Skills to work in a team ✓ Thinking skills with mathematical logic ✓ Report writing skills

Learning and Teaching Strategies استراتيجيات التعلم والتعليم	
Strategies	The main strategy that will be adopted in delivering this module is to encourage students' participation in the exercises, while at the same time refining and expanding their critical thinking skills. This will be achieved through classes, interactive tutorials and by solving exercises..

Student Workload (SWL) الحمل الدراسي للطالب محسوب لـ ١٥ اسبوعا			
Structured SWL (h/sem) الحمل الدراسي المنتظم للطالب خلال الفصل	47	**Structured SWL (h/w)** الحمل الدراسي المنتظم للطالب أسبوعيا	3
Unstructured SWL (h/sem) الحمل الدراسي غير المنتظم للطالب خلال الفصل	128	**Unstructured SWL (h/w)** الحمل الدراسي غير المنتظم للطالب أسبوعيا	8
Total SWL (h/sem)	**150**		

الحمل الدراسي الكلي للطالب خلال الفصل	

Module Evaluation
تقييم المادة الدراسية

		Time/Number	Weight (Marks)	Week Due	Relevant Learning Outcome
Formative assessment	Quizzes	2	20% (10)	5 and 10	LO #1, #2 and #10, #11
	Assignments	2	20% (10)	2 and 12	LO #3, #4 and #6, #7
	Projects / Lab.	0	0%	Continuous	All
	Report	0	0%	13	LO #5, #8 and #10
Summative assessment	Midterm Exam	2hr	10% (10)	7	LO #1 - #7
	Final Exam	3hr	50% (50)	16	All
Total assessment			100% (100 Marks)		

Delivery Plan (Weekly Syllabus)
المنهاج الاسبوعي النظري

	Material Covered
Week 1	• Sets • Subsets • Operations on sets • Computer Representation of Sets
Week 2	• Cartesian product • Sequences • Properties of Integers
Week 3	• Matrices • Propositional and Logical Operations • Conditional Statements
Week 4	• Conditional Statements • Mathematical Induction • Product sets and Partitions
Week 5	• Methods of Proving Theorems • Recursive

	• Relations
Week 6	• Properties of Relations • Operations Relations • Computer Representation of Relations
Week 7	• Properties of Relations • Equivalence Relations • Computer Representation of Relations and Digraphs • Operations and Relations
Week 8	• Functions • Functions for Computer Science • Domain and codomain of the function
Week 9	• Range of the function • Graph of function • • Functions types
Week 10	• Permutation Functions • Graph • The types of graphs
Week 11	• Some Special Simple Graphs • Representing Graphs • Isomorphism and Isomorphic of graphs
Week 12	• Common graphs • Some important concepts
Week 13	• Kinds of graphs • More graphs
Week 14	• Trees • Labeled Trees
Week 15	• Tree Searching • Undirected Trees
Week 16	• Tree Traversal • Traversal Algorithms • Infix, Prefix, and Postfix Notation

Delivery Plan (Weekly Lab. Syllabus) المنهاج الاسبوعي للمختبر	
	Material Covered
Week 1	
Week 2	
Week 3	
Week 4	
Week 5	
Week 6	
Week 7	

Learning and Teaching Resources مصادر التعلم والتدريس		
	Text	**Available in the Library?**
Required Texts	Kolman, Busby, and Ross (2008). Discrete Mathematical Structures, 6th ed. Prentice Hall.	Yes
Recommended Texts	Kenneth Rosen (2012). Discrete Mathematics and Its Applications, 7th ed. Mc-Graw Hill.	No
Websites		

Grading Scheme مخطط الدرجات				
Group	**Grade**	التقدير	**Marks %**	**Definition**
Success Group (50 - 100)	**A -** Excellent	امتياز	90 - 100	Outstanding Performance
	B - Very Good	جيد جدا	80 - 89	Above average with some errors
	C - Good	جيد	70 - 79	Sound work with notable errors
	D - Satisfactory	متوسط	60 - 69	Fair but with major shortcomings
	E - Sufficient	مقبول	50 - 59	Work meets minimum criteria
Fail Group (0 – 49)	**FX –** Fail	راسب (قيد المعالجة)	(45-49)	More work required but credit awarded
	F – Fail	راسب	(0-44)	Considerable amount of work required

Note: Marks Decimal places above or below 0.5 will be rounded to the higher or lower full mark (for example a mark of 54.5 will be rounded to 55, whereas a mark of 54.4 will be rounded to 54. The University has a policy NOT to condone "near-pass fails" so the only adjustment to marks awarded by the original marker(s) will be the automatic rounding outlined above.

MODULE DESCRIPTION FORM

نموذج وصف المادة الدراسية

Module Information معلومات المادة الدراسية					
Module Title	Computer Fundamentals			Module Delivery	
Module Type	Core			☒ Theory ☒ Lecture ☒ Lab ☒ Tutorial ☐ Practical ☐ Seminar	
Module Code	CSITCIS109				
ECTS Credits	7				
SWL (hr/sem)	175				
Module Level	1		Semester of Delivery	2	
Administering Department	CIS		College	CSIT	
Module Leader	Asaad A. Alhijaj		e-mail	asaad.abdulhassan@uobasrah.edu.iq	
Module Leader's Acad. Title	Asst.Prof.		Module Leader's Qualification	Ms.c.	
Module Tutor	Name (if available)		e-mail	E-mail	
Peer Reviewer Name	Name		e-mail	E-mail	
Scientific Committee Approval Date	15/06/2023		Version Number	1.0	

Relation with other Modules العلاقة مع المواد الدراسية الأخرى			
Prerequisite module	None	Semester	
Co-requisites module	None	Semester	

Module Aims, Learning Outcomes and Indicative Contents أهداف المادة الدراسية ونتائج التعلم والمحتويات الإرشادية	
Module Objectives أهداف المادة الدراسية	1. Describe the parts of typical desktop personal computers. 2. Describe the essential elements and duties of computer operating systems. 3. Determine the standards that qualified computer technicians adhere to. 4. Microsoft Windows installations, maintained, configured, and installed. 5. Introduced to the analysis of the architecture of a computer system and its components such as the execution unit, arithmetic and logical (ALU) unit, and memory unit. 6. Gives more details about the number system and logic gates and design it.

Module Learning Outcomes مخرجات التعلم للمادة الدراسية	1. Identify the components of standard desktop personal computers. 2. Identify fundamental components and functions of personal computer operating systems. 3. Identify best practices followed by professional personal computer technicians. 4. Install and configure computer components. 5. Install and configure system components. 6. Maintain and troubleshoot peripheral components. 7. Troubleshoot system components. 8. Install and configure operating systems. 9. Maintain and troubleshoot installations of Microsoft Windows. 10. Students will be introduced to the design and analysis of the hardware of a computer system and its components such as the execution unit, arithmetic and logical (ALU) unit, and memory unit. 11. The characteristics of instruction sets and the architecture of RISC and CISC machine. 12. Gives the students more details about the number system and logic gates and design it.
Indicative Contents المحتويات الإرشادية	1. Personal Computer Components: 2. Operating System Fundamentals 3. Personal Computer Technician Professional Best Practices 4. Installing and Configuring Peripheral Components 5. Maintaining and Troubleshooting Peripheral Components 6. Troubleshooting System Components 7. Installing and Configuring Operating Systems 8. Introduction to Computer Architecture. 9. Computer Instruction Set. 10. Memory Organization. 11. Introduction to number systems 12. Coding systems 13. Logic gates 14. Simplify using gates

Learning and Teaching Strategies استراتيجيات التعلم والتعليم	
Strategies	The main strategy that will be adopted in delivering this module is to encourage students' participation in the exercises, while at the same time refining and expanding their critical thinking skills. This will be achieved through classes, interactive tutorials and by solving exercises.

Student Workload (SWL) الحمل الدراسي للطالب محسوب لـ ١٥ أسبوعا			
Structured SWL (hr/sem) الحمل الدراسي المنتظم للطالب خلال الفصل	**77**	**Structured SWL (hr/w)** الحمل الدراسي المنتظم للطالب أسبوعيا	5
Unstructured SWL (hr/sem) الحمل الدراسي غير المنتظم للطالب خلال الفصل	98	**Unstructured SWL (hr/w)** الحمل الدراسي غير المنتظم للطالب أسبوعيا	6
Total SWL (hr/sem) الحمل الدراسي الكلي للطالب خلال الفصل	**175**		

Module Evaluation تقييم المادة الدراسية					
		Time/Number	**Weight (Marks)**	**Week Due**	**Relevant Learning Outcome**
Formative assessment	**Quizzes**	2	10% (10)	5 and 10	#1, #2 and #10, #11
	Assignments	2	10% (10)	2 and 12	#3, #4 and #6, #7
	Projects / Lab.	1	10% (10)	Continuous	All
	Report	1	10% (10)	13	#5, #8 and #10
Summative assessment	**Midterm Exam**	2hr	10% (10)	7	#1 - #7
	Final Exam	3hr	50% (50)	16	All
Total assessment			100% (100 Marks)		

Delivery Plan (Weekly Syllabus) المنهاج الاسبوعي النظري	
	Material Covered
Week 1	Personal Computer Components • Personal Computer Components • System Unit Components • Storage Devices • Personal Computer Connection Methods
Week 2	Operating System Fundamentals • Personal Computer Operating Systems • Windows User Interface Components • Windows File System Management • Windows System Management Tools
Week 3	PC Technician Professional Best Practices • Tools of the Trade

	• Electrical Safety • Environmental Safety and Materials Handling • Perform Preventative Maintenance • Diagnostics and Troubleshooting • Professionalism and Communication
Week 4	Installing and Configuring Peripheral Components • Install and Configure Display Devices • Install and Configure Input Devices • Install and Configure Adapter Cards • Install and Configure Multimedia Devices
Week 5	Installing and Configuring Peripheral Components • Install and Configure Storage Devices • Install and Configure Power Supplies • Install and Configure Memory • Install and Configure CPUs • Install and Configure System Boards
Week 6	Maintaining and Troubleshooting Peripheral Components • Troubleshoot Display Devices • Maintain and Troubleshoot Input Devices • Troubleshoot Adapter Cards • Troubleshoot Multimedia Devices
Week 7	Troubleshoot Storage Devices • Troubleshoot Power Supplies • Troubleshoot Memory • Troubleshoot CPUs • Troubleshoot System Boards
Week 8	Installing and Configuring Operating Systems • Install Microsoft Windows • Upgrade Windows • Add Devices to Windows • Optimize Windows
Week 9	Introduction to Computer Architecture. • Von Neumann Architecture. • Hardware, Software, and Firmware. • Basics of Computer Architecture. • Computer Structures.

Week 10	Computer Instruction Set.
	• Instruction Types.
	  • Data Transfer Instructions.
	  • Arithmetic Instructions.
	  • Logical Instructions.
	  • Program-control Instructions.
	  • System-control Instructions.
	I/O Instructions.
	• RISC and CISC.

Week 11	Memory Organization. • Memory Types. • Access Modes.

	• RAM Types. • Multilevel Memories (Memory Hierarchy). • Cache Memory. • Elements of Cache Design. • Associative Memory. • Memory Interleaving.
Week 12	Introduction to number systems • Place values and binary to decimal conversion • Decimal to binary conversion • Octal to decimal conversion |(and vice versa) • Hexadecimal to decimal conversion |(and vice versa) • Arithmetic operations in binary
Week 13	Coding systems • Ascii • Excess-3 code • Gray code
Week 14	Logic gates • (And, Or, Xor, Not) gates • (Nor, Nand, Xnor) gates
Week 15	Simplify using gates
Week 16	**Preparatory week before the final Exam**

Delivery Plan (Weekly Lab. Syllabus) المنهاج الاسبوعي للمختبر	
	Material Covered
Week 1	First Look at Computer Parts and Tools
Week 2	Introducing Windows Operating Systems
Week 3	All about Motherboards & Supporting Processors and Upgrading Memory
Week 4	Supporting Hard Drives
Week 5	Installing Windows
Week 6	Satisfying Customer Needs
Week 7	PC Maintenance and Troubleshooting Strategies
Week 8	Maintaining Windows and Optimizing Windows
Week 9	Troubleshooting Windows and Applications and Troubleshooting Windows Startup Problems
Week 10	Troubleshooting Hardware Problems
Week 11	Memory addressing
Week 12	Perform various encryption operations.
Week 13	Learn how to deal with logical design programs.
Week 14	How to design logic gates.
Week 15	Simple logical design project.

Learning and Teaching Resources
مصادر التعلم والتدريس

	Text	Available in the Library?
Required Texts	Textbook: 1. (Wiley series on parallel and distributed computing) Abd-El-Barr M., El-Rewini H. - Fundamentals of Computer Organization and Architecture-Wiley (2005) 2. Michael Meyers-Mike Meyers CompTIA A+ Guide_ Essentials Lab Manual, Third Edition (Exam 220-701) (Mike Meyers' Computer Skills) (2010) 3. CH Roth Jr, LL Kinney, EB John. Fundamentals of logic design- Cengage Learning (2013)	Yes (E-copy)

Grading Scheme
مخطط الدرجات

Group	Grade	التقدير	Marks %	Definition
Success Group (50 - 100)	**A -** Excellent	امتياز	90 - 100	Outstanding Performance
	B - Very Good	جيد جدا	80 – 89	Above average with some errors
	C - Good	جيد	70 – 79	Sound work with notable errors
	D - Satisfactory	متوسط	60 – 69	Fair but with major shortcomings
	E - Sufficient	مقبول	50 – 59	Work meets minimum criteria
Fail Group (0 – 49)	**FX –** Fail	راسب (قيد المعالجة)	(45-49)	More work required but credit awarded
	F – Fail	راسب	(0-44)	Considerable amount of work required

Note: Marks Decimal places above or below 0.5 will be rounded to the higher or lower full mark (for example a mark of 54.5 will be rounded to 55, whereas a mark of 54.4 will be rounded to 54. The University has a policy NOT to condone "near-pass fails" so the only adjustment to marks awarded by the original marker(s) will be the automatic rounding outlined above.

MODULE DESCRIPTION FORM

نموذج وصف المادة الدراسية

Module Information معلومات المادة الدراسية					
Module Title	Human Right			Module Delivery	
Module Type	Core			☒ Theory ☒ Lecture ☐ Lab ☐ Tutorial ☐ Practical ☐ Seminar	
Module Code	CSIT0111				
ECTS Credits	2				
SWL (hr/sem)					
Module Level			Semester of Delivery	1	
Administering Department	CIS		College	CSIT	
Module Leader	Dr. hassan malih naser		e-mail	Hassan.malih@uobasrah.edu.iq	
Module Leader's Acad. Title	Lecturer		Module Leader's Qualification	MSc.	
Module Tutor	Name (if available)		e-mail		
Peer Reviewer Name			e-mail		
Scientific Committee Approval Date	2024-2025		Version Number		

Relation with other Modules العلاقة مع المواد الدراسية الأخرى			
Prerequisite module	This subject links the student's scientific side with dealing with all the requirements of his life in terms of his interaction with society.	Semester	
Co-requisites module		Semester	

Module Aims, Learning Outcomes and Indicative Contents أهداف المادة الدراسية ونتائج التعلم والمحتويات الإرشادية	
Module Aims أهداف المادة الدراسية	1. to develop the methods of understanding human rights accurately. 2. to develop the techniques of learning the laws of human rights. 3. To develop problem solving skills and text understanding of human rights. 4. historical insights into human rights since their inception. 5. This course deals with the basic concept of Human rights. 6. This is the basic theme for the understandings of human rights 7. To Understanding Human Rights in the 2005 Iraqi Constitution 8. To understand human rights in different systems of government, for example: totalitarian, dictatorships, authoritarian dictatorships, Presidential. Democracies and parliamentary democracies
Module Learning Outcomes مخرجات التعلم للمادة الدراسية	1. Recognize how understand the human rights. 2. To know what are human rights. 3. list for the most important terms of human rights 4. Summarize what is meant by a human rights. 5. Learning the relationship between rights and duties. 6. Explain human rights in different eras 7. Define human rights. 8. Identify the fundamental difference between women's and men's rights. 9. Identify human rights in different systems of government.
Indicative Contents المحتويات الإرشادية	General and transferable skills (other skills related to employability and personal development). 1. Enabling students to write reports on topics related to human rights. 2. Enabling students to connect theories to the practical realities of rights and freedoms. 3. Enabling students to pass professional examinations organized by local or international bodies. 4. Enabling students to engage in continuous self-development after graduation. 5. Holding special seminars for students to develop their personalities.

Learning and Teaching Strategies استراتيجيات التعلم والتعليم	
Strategies	Teaching and Learning Strategy 1. Lectures on the subject in paper and electronic format (PowerPoint) are presented to students. 2. Lectures are delivered in detail. 3. Request periodic reports and homework on the core topics of the subject. Evaluation Methods

	1. Daily discussion to determine students' comprehension of the subject and assess daily participation. 2. Daily exams with a variety of short scientific questions to assess students' comprehension of the subject. 3. Allocating a portion of each semester's grade to homework. 4. Daily exams (Quizat), monthly exams for the curriculum, and a final exam. Affective and Value-Based Objectives 1. Encourage students to understand the overall purpose of studying the subject. 3. Encourage students to understand the function, code, or term within the subject. 4. Encourage students to reflect on how to develop themselves in the field of computers and software. 4- Enabling students to use computers and software. D- General and transferable skills (other skills related to employability and personal development). 1- Enabling students to write reports on topics related to democracy. 2- Enabling students to connect theories to the practical realities of rights and freedoms. 3- Enabling students to pass professional exams organized by local or international bodies. 4- Enabling students to engage in continuous self-development after graduation. 5- Holding special seminars for students for the purpose of personal self-development.

Student Workload (SWL) الحمل الدراسي للطالب					
Structured SWL (h/sem)			32	**Structured SWL (h/w)** الحمل الدراسي المنتظم للطالب أسبوعيا	2
		Time/Number			
Formative assessment	**Quizzes**				
	Assignments				
	Projects / Lab.				
	Report				
Summative assessment	**Midterm Exam**				
	Final Exam				
Total assessment					
الحمل الدراسي المنتظم للطالب خلال الفصل					
Unstructured SWL (h/sem) الحمل الدراسي غير المنتظم للطالب خلال الفصل			18	**Unstructured SWL (h/w)** الحمل الدراسي غير المنتظم للطالب أسبوعيا	3

Total SWL (h/sem) الحمل الدراسي الكلي للطالب خلال الفصل	50

Module Evaluation تقييم المادة الدراسية					
As		**Time/Number**	**Weight (Marks)**	**Week Due**	**Relevant Learning Outcome**
Formative assessment	**Quizzes**	**2**	**15% (15)**	**5 and 10**	**LO #1, #2 and #10, #11**
	Assignments	**2**	**15% (15)**	**2 and 12**	**LO #3, #4 and #6, #7**
	Projects / Lab.			**Continuous**	**All**
	Report	**1**	**10% (10)**	**13**	**LO #5, #8 and #10**
Summative assessment	**Midterm Exam**	**2hr**	**10% (10)**	**7**	**LO #1 - #7**
	Final Exam	**3hr**	**50% (50)**	**16**	**All**
Total assessment			**100% (100 Marks)**		

Delivery Plan (Weekly Syllabus) المنهاج الاسبوعي النظري	
	Material Covered
Week 1	Introduction to the creation Theory and definition of human rights
Week 2	Human rights in ancient civilizations
Week 3	Human rights in divine laws and religions
Week 4	The concept and characteristics of human rights
Week 5	The concept of freedom and liberties
Week 6	Iraqi Constitution 2005
Week 7	Mid-Exam
Week 8	Types of rights and freedoms/ the right to life and work
Week 9	The History of Democracy
Week 10	political systems
Week 11	main pillars of democracy and democracy types
Week 12	Human rights guarantees at the international level

Week 13	Islam and Democracy
Week 14	Technological progress and its impact on rights and freedoms
Week 15	**repetition of the important keywords**

Delivery Plan (Weekly Lab. Syllabus)

المنهاج الاسبوعي للمختبر

	Material Covered
Week 1	
Week 2	
Week 3	
Week 4	
Week 5	
Week 6	
Week 7	
Week 8	

Learning and Teaching Resources

مصادر التعلم والتدريس

	Text	**Available in the Library?**
Required Texts	Text, Visits, discussion with experts. to have a discussion	yes
Recommended Texts		
Websites		

Grading Scheme

مخطط الدرجات

Group	**Grade**	التقدير	**Marks (%)**	**Definition**
Success Group (50 - 100)	**A** - Excellent	امتياز	90 - 100	Outstanding Performance
	B - Very Good	جيد جدا	80 - 89	Above average with some errors
	C - Good	جيد	70 - 79	Sound work with notable errors
	D - Satisfactory	متوسط	60 - 69	Fair but with major shortcomings
	E - Sufficient	مقبول	50 - 59	Work meets minimum criteria

Fail Group (0 – 49)	**FX –** Fail	راسب (قيد المعالجة)	(45-49)	More work required but credit awarded
	F – Fail	راسب	(0-44)	Considerable amount of work required

Note: Marks Decimal places above or below 0.5 will be rounded to the higher or lower full mark (for example a mark of 54.5 will be rounded to 55, whereas a mark of 54.4 will be rounded to 54. The University has a policy NOT to condone "near-pass fails" so the only adjustment to marks awarded by the original marker(s) will be the automatic rounding outlined above.

MODULE DESCRIPTION FORM

Module Information					
Module Title	Mathematics for Information Systems			Module Delivery	
Module Type	Core			☒ Theory ☒ Lecture ☒ Lab ☐ Tutorial ☐ Practical ☐ Seminar	
Module Code	UoB12345				
ECTS Credits	6				
SWL (hr/sem)	150				
Module Level		1	Semester of Delivery		1
Administering Department		CIS	College	CSIS	
Module Leader	Hadell ismail mustafa		e-mail	hadeel.mustafa@uobasrah.edu.iq	
Module Leader's Acad. Title		Lecturer	Module Leader's Qualification		Ph.D.
Module Tutor	Name (if available)		e-mail	E-mail	
Peer Reviewer Name		Name	e-mail	E-mail	
Scientific Committee Approval Date		01/06/2024	Version Number		1.0

Relation with other Modules			
Prerequisite module	None	Semester	
Co-requisites module	None	Semester	

Module Aims, Learning Outcomes and Indicative Contents

Module Objectives	1. Gain the necessary mathematical knowledge to deal with the language of computers. 2. The skill of using mathematical laws and expressing them in scientific mathematical symbols 3. Understanding of mathematical structures, especially the numerical, algebraic and geometric systems. 4. Awareness of the integration of experience represented in the investment of mathematical knowledge in other fields of study. 5. Understanding the nature of mathematics as an integrated system.
Module Learning Outcomes	6. Understand quadratic, cubic, exponential, logarithmic and hyperbolic functions. 7. Understand the inverse of the previous functions and their graphs. 8. Learning limits, continuity. 9. Learning derivatives and their applications. 10. Learning integrations and its applications.
Indicative Contents	Indicative content includes the following. <u>Functions</u> Functions and Their Graphs, Trigonometric Functions [8 hrs] <u>Limits and Continuity</u> Limit of a Function and Limit Laws, The Precise Definition of a Limit, One-Sided Limits, Continuity [8 hrs] <u>Derivatives</u> The Derivative as a Function, Differentiation Rules, Derivatives of Trigonometric Functions, The Chain Rule, Implicit Differentiation. [9 hrs] <u>Applications of Derivatives</u> Extreme Values of Functions on Closed Intervals, The Mean Value Theorem, Monotonic Functions and the First Derivative Test, Concavity and Curve Sketching, Applied Optimization. [10 hrs] <u>Integrals</u> The Definite Integral, The Fundamental Theorem of Calculus, Indefinite Integrals and the Substitution Method, Definite Integral Substitutions and the Area Between Curves.[10 hrs]

Learning and Teaching Strategies

Strategies	The main strategy that will be adopted in delivering this module is to encourage students' participation in the exercises, while at the same time refining and expanding their critical thinking skills. This will be achieved through classes, interactive tutorials and by solving exercises.

Student Workload (SWL)

Structured SWL (h/sem)	47	**Structured SWL (h/w)**	3
Unstructured SWL (h/sem)	103	**Unstructured SWL (h/w)**	6
Total SWL (h/sem)	**150**		

Module Evaluation

		Time/Number	Weight (Marks)	Week Due	Relevant Learning Outcome
Formative assessment	**Quizzes**	2	20% (10)	5 and 10	LO #1, #2 and #10, #11
	Assignments	2	20% (10)	2 and 12	LO #3, #4 and #6, #7
	Projects / Lab.	0	0% (0)		
	Report		0% (0)		
Summative assessment	**Midterm Exam**	2hr	10% (10)	7	LO #1 - #7
	Final Exam	3hr	50% (50)	16	All
Total assessment			100% (100 Marks)		

Delivery Plan (Weekly Syllabus)

	Material Covered
Week 1	Functions and Their Graphs, Trigonometric Functions
Week 2	Rates of Change and Tangent Lines to Curves, Limit of a Function and Limit Laws, The Precise Definition of a Limit

Week 3	One-Sided Limits, Continuity
Week 4	Tangent Lines and the Derivative at a Point, The Derivative as a Function, Differentiation Rules
Week 5	The Derivative as a Rate of Change, Derivatives of Trigonometric Functions
Week 6	The Chain Rule, Implicit Differentiation
Week 7	Mid-term Exam
Week 8	Area and Estimating with Finite Sums, Sigma Notation and Limits of Finite Sums
Week 9	The Definite Integral
Week 10	The Fundamental Theorem of Calculus
Week 11	The Fundamental Theorem of Calculus
Week 12	Indefinite Integrals and the Substitution Method
Week 13	Indefinite Integrals and the Substitution Method
Week 14	Indefinite Integrals and the Substitution Method
Week 15	Preparation before final exam
Week 16	

Delivery Plan (Weekly Lab. Syllabus)

	Material Covered
Week 1	
Week 2	
Week 3	
Week 4	
Week 5	
Week 6	
Week 7	

Learning and Teaching Resources

	Text	**Available in the Library?**
Required Texts	Calculus, George B. Thomas, Pearson 14th edition	Yes
Recommended Texts	Calculus, Vol.1, EDWIN "JED" HERMAN	No
Websites	https://www.coursera.org/learn/introduction-to-calculus	

Grading Scheme				
Group	**Grade**		**Marks %**	**Definition**
Success Group (50 - 100)	**A –** Excellent		90 - 100	Outstanding Performance
	B - Very Good		80 - 89	Above average with some errors
	C – Good		70 - 79	Sound work with notable errors
	D – Satisfactory		60 - 69	Fair but with major shortcomings
	E – Sufficient		50 - 59	Work meets minimum criteria
Fail Group (0 – 49)	**FX –** Fail		(45-49)	More work required but credit awarded
	F – Fail		(0-44)	Considerable amount of work required

Note: Marks Decimal places above or below 0.5 will be rounded to the higher or lower full mark (for example a mark of 54.5 will be rounded to 55, whereas a mark of 54.4 will be rounded to 54. The University has a policy NOT to condone "near-pass fails" so the only adjustment to marks awarded by the original marker(s) will be the automatic rounding outlined above.

MODULE DESCRIPTION FORM

نموذج وصف المادة الدراسية

Module Information معلومات المادة الدراسية					
Module Title	Information System Principles			Module Delivery	
Module Type	Core			☒ Theory ☒ Lecture ☒ Lab ☐ Tutorial ☐ Practical ☐ Seminar	
Module Code	CSITCIS103				
ECTS Credits	6				
SWL (hr/sem)	150				
Module Level	1		Semester of Delivery	1	
Administering Department	CIS		College	CSIS	
Module Leader	Marwah Kamil Hussein		e-mail	Marwa.hussein@uobasrah.edu.iq	
Module Leader's Acad. Title	Ass. Prof.		Module Leader's Qualification	A.P.	
Module Tutor	Name (if available)		e-mail	E-mail	
Peer Reviewer Name	Name		e-mail	E-mail	
Scientific Committee Approval Date	01/07/2024		Version Number	1.0	

Relation with other Modules العلاقة مع المواد الدراسية الأخرى			
Prerequisite module	None	Semester	
Co-requisites module	None	Semester	

Module Aims, Learning Outcomes and Indicative Contents أهداف المادة الدراسية ونتائج التعلم والمحتويات الإرشادية	
Module Objectives أهداف المادة الدراسية	1. Learn having an understanding of information Systems provides added insight into other fields. 2. Learn an understanding of the effective and responsible use and management of information systems is important for managers and other business knowledge workers in today's global information Society. 3. Learn that people must understand the components of information systems and how all of these components work together to bring value to an organization. 4. We need to turn our attention to the role that information systems play in an Organization. 5. The competitiveness of most companies is in a large degree based on the effective use of information systems, therefore we must to think about what advantages and disadvantages Can bring to the businesses and society the integrating information system
Module Learning Outcomes مخرجات التعلم للمادة الدراسية	1. Identify components of an information systems infrastructure and their role in achieving organization goals. (SO:0; PI:0.1) 2. 2. Relate how information systems are enabling new forms of commerce and collaboration between individuals, organizations, and governments. (SO:6; PI:6.2) 3. 3. Explain the use of information system in an organization and its value in supporting organizational processes and decision making. (SO:6; PI:6.1) 4. 4. Analyze security, professional, social and ethical issues in development, deployment and usage of an information system. (SO:4; PI:4.2) CYS (SO:6; PI:6.2) 5. 5. Show responsibility for their own learning and continuing personal and professional development. (SO:4; PI:4.1)
Indicative Contents المحتويات الإرشادية	Indicative content includes the following. - Use of Information System in Organization - Careers in information systems - Hardware and software concepts - Software development concepts and detailed stages - Database and data modeling concepts - Internet and WWW - Knowledge Management and Specialized Information Systems - Valuing Information System and Globalization - Information and Decision Support Systems - Business Intelligence - Security, Privacy and Ethical issues of Information System

Learning and Teaching Strategies استراتيجيات التعلم والتعليم	
Strategies	Type something like: The main strategy that will be adopted in delivering this module is to encourage students' participation in the exercises, while at the same time refining and expanding their critical thinking skills. This will be achieved through classes, interactive tutorials and by solving exercises.

Student Workload (SWL) الحمل الدراسي للطالب محسوب لـ ١٥ أسبوعا			
Structured SWL (h/sem) الحمل الدراسي المنتظم للطالب خلال الفصل	32	**Structured SWL (h/w)** الحمل الدراسي المنتظم للطالب أسبوعيا	2
Unstructured SWL (h/sem) الحمل الدراسي غير المنتظم للطالب خلال الفصل	118	**Unstructured SWL (h/w)** الحمل الدراسي غير المنتظم للطالب أسبوعيا	7
Total SWL (h/sem) الحمل الدراسي الكلي للطالب خلال الفصل	**150**		

Module Evaluation تقييم المادة الدراسية					
		Time/Number	**Weight (Marks)**	**Week Due**	**Relevant Learning Outcome**
Formative assessment	**Quizzes**	2	20% (10)	5 and 10	LO #1, #2 and #10, #11
	Assignments	2	20% (10)	2 and 12	LO #3, #4 and #6, #7
	Projects / Lab.	0	0% (0)		
	Report		0% (0)		
Summative assessment	**Midterm Exam**	2hr	10% (10)	7	LO #1 - #7
	Final Exam	3hr	50% (50)	16	All
Total assessment			100% (100 Marks)		

Delivery Plan (Weekly Syllabus) المنهاج الاسبوعي النظري	
	Material Covered
Week 1	Why information system are important

Week 2	Is framework for business professionals.
Week 3	The components of information system
Week 4	The role of information Systems
Week 5	Advantages and disadvantages of information system
Week 6	Careers in information systems
Week 7	Mid-term Exam
Week 8	Information technology concepts
Week 9	Classification of information
Week 10	System concepts
Week 11	Hardware
Week 12	Internal and external memory
Week 13	Software
Week 14	Application software
Week 15	Cloud computing
Week 16	

Delivery Plan (Weekly Lab. Syllabus) المنهاج الاسبوعي للمختبر	
	Material Covered
Week 1	
Week 2	
Week 3	
Week 4	
Week 5	
Week 6	
Week 7	

Learning and Teaching Resources مصادر التعلم والتدريس		
	Text	**Available in the Library?**
Required Texts	Ralph, M. Stair, George W. Reynolds, Thomas Chesney, "Principles of Business Information Systems", 3rd Edition, 2018. ISBN 9781473748415	Yes

Recommended Texts	Joseph Valacich , Christoph Schneider, "Information Systems Today: Managing in a Digital World" 7th Edition, 2015 ISBN-13: 978-0133940473 ISBN-10: 01339404705	No
Websites		

Grading Scheme
مخطط الدرجات

Group	Grade	التقدير	Marks %	Definition
Success Group (50 - 100)	**A –** Excellent	امتياز	90 - 100	Outstanding Performance
	B - Very Good	جيد جدا	80 - 89	Above average with some errors
	C – Good	جيد	70 - 79	Sound work with notable errors
	D – Satisfactory	متوسط	60 - 69	Fair but with major shortcomings
	E – Sufficient	مقبول	50 - 59	Work meets minimum criteria
Fail Group (0 – 49)	**FX –** Fail	راسب (قيد المعالجة)	(45-49)	More work required but credit awarded
	F – Fail	راسب	(0-44)	Considerable amount of work required

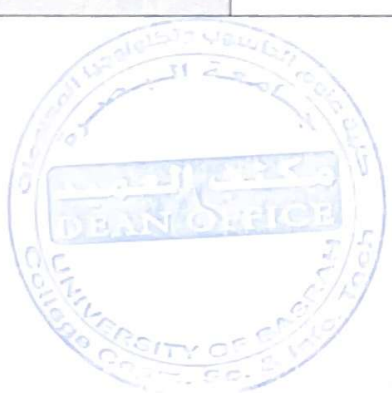
Note: Marks Decimal places above or below 0.5 will be rounded to the higher or lower full mark (for example a mark of 54.5 will be rounded to 55, whereas a mark of 54.4 will be rounded to 54. The University has a policy NOT to condone "near-pass fails" so the only adjustment to marks awarded by the original marker(s) will be the automatic rounding outlined above.

MODULE DESCRIPTION FORM

2024\2025

Module Information					
Module Title	Computer Programming I			**Module Delivery**	
Module Type	BASIC			☒ Theory ☒ Lecture ☒ Lab ☐ Tutorial ☒ Practical ☐ Seminar	
Module Code	CIS101				
ECTS Credits	7				
SWL (hr/sem)	175				
Module Level		1	**Semester of Delivery**		1
Administering Department		CIS	**College**	CSIT	
Module Leader	Noor Mohammed Jumaa		**e-mail**	noor.jumaa@uobasrah.edu.iq	
Module Leader's Acad. Title		Assistant lecturer	**Module Leader's Qualification**		M.Sc
Module Tutor	No		**e-mail**	E-mail	
Peer Reviewer Name		No	**e-mail**	E-mail	
Scientific Committee Approval Date		2023-11-04	**Version Number**		1.0

Relation with other Modules			
Prerequisite module	No	**Semester**	No
Co-requisites module	No	**Semester**	No



Module Aims, Learning Outcomes and Indicative Contents	
Module Objectives	Understanding the effective and responsible use and management of a programming language is crucial for managers and other business knowledge workers in today's global information society. Therefore, individuals should understand the components of a programming language and how all these components work together. • What is a programming language? • Learn the basics of writing algorithms and flowcharts. • How to approach and solve problems. • Learn the fundamental concepts of structured programming using C++. • Learn control structures. • Introduction to functions.
Module Learning Outcomes	1. Knowledge objectives: • Develop the fundamental skills for using algorithms to solve problems programmatically • Test algorithms and debug errors • Translate algorithms into a program written in C++ • Implement, execute, and test a program written in C++ 2. Course-specific skills objectives: • Ability to convert problems into programming algorithms • Ability to convert algorithms into a program written in C++ • Ability to test the program and how to debug and handle errors

Learning and Teaching Strategies	
Strategies	The main strategy for developing such a unit is blended learning aimed at practical competency by defining specific, measurable, achievable, relevant, and time-bound (SMART) learning objectives for each part of the unit. Combine online resources, video lectures, readings, and interactive activities to provide a balanced learning experience. In addition, encourage students to engage in exercises that hone and expand their critical thinking skills, achieved through classroom and laboratory sessions, interactive lessons, and studying types of simple experiments that include some basic modeling activities relevant to the students.

Student Workload (SWL) الحمل الدراسي للطالب محسوب لـ ١٥ أسبوعا			
Structured SWL (h/sem)	75	**Structured SWL (h/w)**	4
Unstructured SWL (h/sem)	98	**Unstructured SWL (h/w)**	2
Total SWL (h/sem)	**175**		

Module Evaluation					
		Time/Number	**Weight (Marks)**	**Week Due**	**Relevant Learning Outcome**
Formative assessment	**Quizzes**	2	10% (10)	6 and 10	LO #4, #5 and #8, #9
	Assignments	2	10% (10)	4 and 11	LO #3, # 2and #8, #9
	Projects /	1	10% (10)	Continuous	All
	Report	1	10% (10)	13	LO #5, #8 and #10
Summative assessment	**Midterm Exam**	2hr	10% (10)	7	LO #1 - #7
	Final Exam	3hr	50% (50)	16	All
Total assessment			100% (100 Marks)		

Delivery Plan (Weekly Syllabus)	
	Material Covered
Week 1	General introduction to computers and programming languages
Week 2	Concept of algorithms and the mechanism of writing them
Week 3	Writing algorithms and flowcharts
Week 4	Introduction to C++ and the mechanism of writing comments and basics of writing a program
Week 5	Data types and variables in C++
Week 6	Basic input and output, operators, and arithmetic operations

Week 7	Midterm exam
Week 8	Decision-making statements(If statement)
Week 9	Decision-making statements (nested if statement)
Week 10	Decision-making statements (switch case)
Week 11	Loops and their types (for loop)
Week 12	Loops and their types (nested for loop)
Week 13	Loops and their types (while loop)
Week 14	Loops and their types (do while loop) with an introduction to functions in C++
Week 15	Preparatory week before the final exam

Delivery Plan (Weekly Lab. Syllabus)	
	Material Covered
Week 1	Lab 1: How to open CodeBlocks used for writing C++ code, how to create a file and save it, and identifying the menus.
Week 2	Lab 2: Providing the student with an introduction to how to start writing a program with execution.
Week 3	Lab 3: execute many examples of VARIABLE TYPES
Week 4	Lab 4: Implementing several programs about input and output methods, with the implementation of arithmetic operations on them.
Week 5	Lab 5: Implementing a set of programs about arithmetic and relational operations on variables.
Week 6	Lab 6: Implementing a set of programs using an if statement
Week 7	Lab 7: Implementing a set of programs using nested if statement
Week 8	Lab 8: Implementing programs using (switch case)
Week 9	Lab 9: Implementing Programs Using Loops and Their Types (For Loop)
Week 10	Lab 10: Implementing Programs Using Loops and Their Types (Nested For Loop)
Week 11	Lab 11: Implementing Programs Using Loops and Their Types (While Loop)
Week 12	Lab 12: Implementing Programs Using Loops and Their Types (Do While Loop)
Week 13	Lab 13: Comprehensive Practical Exam Covering All of the Above
Week 14	Lab 14: Implementing Programs Using Function Writing in C++

Learning and Teaching Resources

	Text	Available in the Library?
Required Texts	• Fundamentals of programming c++ , richard l. halterman, school of computing southern Adventist university, December 2,2018. • A first book of c++ by gary Bronson, 4th edition , 2012 • Problem solving with c++ by walter Savitch ,7th edition , 2009 C++ the complete reference by Herbert Schildt, 4th edition, 2003	Available
Recommended Texts	) تعلم لغة C++ للمبتدئين (; لغات البرمجة للمبتدئين	Yes
Websites	https://www.cartercenter.org/resources/pdfs/health/ephti/library/lecture_notes/med_lab_tech_students/medicallabtechnology.pdf	

Grading Scheme

Group	Grade		Marks %	Definition
Success Group (50 - 100)	**A -** Excellent		90 - 100	Outstanding Performance
	B - Very Good		80 - 89	Above average with some errors
	C - Good		70 - 79	Sound work with notable errors
	D - Satisfactory		60 - 69	Fair but with major shortcomings
	E - Sufficient		50 - 59	Work meets minimum criteria
Fail Group (0 – 49)	**FX** – Fail		(45-49)	More work required but credit awarded
	F – Fail		(0-44)	Considerable amount of work required

Note: Marks Decimal places above or below 0.5 will be rounded to the higher or lower full mark (for example a mark of 54.5 will be rounded to 55, whereas a mark of 54.4 will be rounded to 54. The University has a policy NOT to condone "near-pass fails" so the only adjustment to marks awarded by the original marker(s) will be the automatic rounding outlined above.

MODULE DESCRIPTION FORM

2024/2025

Module Information					
Module Title	Computer ProgrammingII			Module Delivery	
Module Type	BASIC			☒ Theory ☒ Lecture ☒ Lab ☐ Tutorial ☒ Practical ☐ Seminar	
Module Code	CIS106				
ECTS Credits	8				
SWL (hr/sem)	200				
Module Level	1	Semester of Delivery	2		
Administering Department	CIS	College	CSIT		
Module Leader	NOOR MOHAMMED JUMAA	e-mail	Noor.jumaa@uobasrah.edu.iq		
Module Leader's Acad. Title	Assist	Module Leader's Qualification	M.Sc		
Module Tutor	No	e-mail	E-mail		
Peer Reviewer Name	No	e-mail	E-mail		
Scientific Committee Approval Date	29/02/2024	Version Number	1.0		

Relation with other Modules			
Prerequisite module	Computer ProgrammingI1	Semester	1
Co-requisites module	None	Semester	No

Module Aims, Learning Outcomes and Indicative Contents	
Module Objectives	1. Learn of programming languages provides added insight into other fields. 2. Learn an understanding of the effective and responsible use and management of program language is important for managers and other business knowledge workers in today's global information Society. 3. Learn that people must understand the components of programming langauge and how all of these components work together to bring value to an organization. 4. We need to turn our attention to the role that programming language playin today's global information Society. 5. Why learn about loop type? - for..loop - while..loop 6. Why Learn about functions? - Defining a Function, Calling a Function, Function Arguments(Call by value, Call by Reference) 7. Why learn about series? 8. Why learn about Shape? 9. Why learn about Array?
Module Learning Outcomes	1- Give the student the most important skills to become a C++ power users have a broad understanding of C++ language and they know which tool or function is best used in a given situation. 2- Learn how to write and use the most important functions 3- Ability to convert issues into a program written in C++ 4- Ability to test programs and how to debug them

Learning and Teaching Strategies	
Strategies	The main strategy that will be adopted in delivering this module is to encourage students' participation in the exercises, while at the same time refining and expanding their critical thinking skills. This will be achieved through classes and the lab, interactive tutorials, and by considering types of simple experiments involving some sampling activities that are interesting to the students.

Student Workload (SWL)

Structured SWL (h/sem) الحمل الدراسي المنتظم للطالب خلال الفصل	90	**Structured SWL (h/w)** الحمل الدراسي المنتظم للطالب أسبوعيا	4
Unstructured SWL (h/sem) الحمل الدراسي غير المنتظم للطالب خلال الفصل	108	**Unstructured SWL (h/w)** الحمل الدراسي غير المنتظم للطالب أسبوعيا	5
Total SWL (h/sem) الحمل الدراسي الكلي للطالب خلال الفصل	**200**		

Module Evaluation
تقييم المادة الدراسية

		Time/Number	Weight (Marks)	Week Due	Relevant Learning Outcome
Formative assessment	**Quizzes**	2	10% (10)	5 and 10	LO #3, #4 and #8, #9
	Assignments	2	10% (10)	4and 11	LO #3, #2 and #9, #10
	Projects / Lab.	1	10% (10)	Continuous	All
	Report	1	10% (10)	13	LO #5, #8 and #10
Summative assessment	**Midterm Exam**	1hr	10% (10)	12	LO #1 - #11
	Final Exam	2hr	50% (50)	16	All
Total assessment			100% (100 Marks)		

Delivery Plan (Weekly Syllabus)

	Material Covered
Week 1	Introduction to Computer Programming language
Week 2	Loop type (break with continue)
Week 3	Series in C++
Week 4	Shape in C++
Week 5	Function in C++
Week 6	Function in C++
Week 7	Introduction to array
Week 8	One dimention array
Week 9	One dimention array with search

Week 10	One dimention array with Sort
Week 11	One dimention array with Function
Week 12	Midterm exam
Week 13	Two dimention array
Week 14	Two dimention array with Array sort and search
Week 15	Two dimention array with Function

Delivery Plan (Weekly Lab. Syllabus)	
	Material Covered
Week 1	Lab 1: execute many examples of Loop type
Week 2	Lab 2: execute many examples of Loop type (break with continue)
Week 3	Lab 3: execute many examples of Use Series in C++
Week 4	Lab 4: execute many examples of Use Shape in C++
Week 5	Lab 5: execute many examples of function in C++
Week 6	Lab 6: execute many examples of function in C++
Week 7	Lab 7: execute many examples of array
Week 8	Lab 8 execute many examples of one dimention array
Week 9	Lab9: execute many examples of search in array
Week 10	Lab 10: execute many examples of sort in one array
Week 11	Lab 11: exam
Week 12	Lab 12: execute many examples of One dimention array with Function
Week 13	Lab 13:execute many examples of two dimention
Week 14	Lab 14: execute many examples of Two dimention array with sort
Week 15	Lab15: execute many examples of Two dimention array with Function

Learning and Teaching Resources		
	Text	**Available in the Library?**
Required Texts	1. Fundamentals of Programming C++, Richard L. Halterman, school of Computing Southern Adventist University, December 2, 2018.	Yes

	2. A first book of c++ by Gary Bronson, 4th edition, 2012 by Gary Bronson 3. Problem solving with c++ by Walter Savitch, 7th edition,2009. 4. C++: The Complete Reference by Herbert Schildt, 4th edition, 2003	
Recommended Texts	تعلم لغة (C++) للمبتدئين ; لغات البرمجة للمبتدئين	Yes
Websites	https://www.programiz.com/cpp-programming	

Grading Scheme
مخطط الدرجات

Group	Grade	التقدير	Marks %	Definition
Success Group (50 - 100)	**A** – Excellent	امتياز	90 - 100	Outstanding Performance
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