

Enrollment No.....



Faculty of Science
End Sem Examination May-2024

BC3CO56 Web Technologies & Frameworks

Programme: B.Sc.

Branch/Specialisation: Computer
Science / All**Duration: 3 Hrs.****Maximum Marks: 60**

Note: All questions are compulsory. Internal choices, if any, are indicated. Answers of Q.1 (MCQs) should be written in full instead of only a, b, c or d. Assume suitable data if necessary. Notations and symbols have their usual meaning.

- | | | | |
|-----|------|--|----------|
| Q.1 | i. | Which of the correct statement about JavaScript? | 1 |
| | | (a) JavaScript is an Object-Based language | |
| | | (b) JavaScript is Assembly-language | |
| | | (c) JavaScript is an Object-Oriented language | |
| | | (d) JavaScript is a High-level language | |
| | ii. | What is the purpose of the Dojo framework? | 1 |
| | | (a) Focuses on DOM and Ajax utilities | |
| | | (b) Advertises incredible depth | |
| | | (c) Ajax utilities | |
| | | (d) Modular | |
| | iii. | The fs module stands for: | 1 |
| | | (a) File Service | |
| | | (b) File System | |
| | | (c) File Store | |
| | | (d) File Sharing | |
| | iv. | To install the Node.js express module we have to use which command? | 1 |
| | | (a) \$ npm install express | |
| | | (b) \$ node install express | |
| | | (c) \$ install express | |
| | | (d) None of these | |
| | v. | What is a Model in MVC? | 1 |
| | | (a) The lowest level of the pattern responsible for maintaining data | |
| | | (b) Represents server-side data | |
| | | (c) Represents data stored in a database | |
| | | (d) None of these | |

[2]

- vi. Which of the following statement is correct about data binding in AngularJS? **1**
 (a) Automatic synchronization of data between model and view components
 (b) Automatic synchronization of data between model and controller components
 (c) Technique to save html data in the database
 (d) Technique to bind database data to html control
- vii. What does the meaning of min mean in following JavaScript code? **1**
`<script src="jquery-1.4.2.min.js"></script>`
 (a) Minimised version (b) Miniature
 (c) Minimised parameters (d) Minimum value
- viii. Which of the following is a single global function defined in the jQuery library? **1**
 (a) jQuery() (b) \$()
 (c) Queryanalysis() (d) global()
- ix. Which of the following contains strong models for URL routing (mapping an incoming URL to a server function), and manages HTTP requests and responses? **1**
 (a) MongoDB (b) Express (c) Angular (d) Node
- x. The M in MEAN stack stands for _____. **1**
 (a) Mongoose (b) MySQL (c) MongoDB (d) Material.js
- Q.2 i. Explain JavaScript Frameworks in brief. **4**
 ii. Explain type of JavaScript framework and compare it. **6**
 OR iii. Explain following: **6**
 (a) Node.js (b) AngularJS (c) Dojo
- Q.3 i. What are the modules in Node.js? Explain. **3**
 ii. Explain RESTFul API, scaling and packaging. **7**
 OR iii. What is NPM? Explain it with their uses of flags. **7**
- Q.4 i. What is Angular JS? Explain with its uses. **4**
 ii. Explain MVC with its component in brief. **6**
 OR iii. Explain following: **6**
 (a) Directives (b) Factories
 (c) Dependency injection

[3]

- Q.5 i. Explain difference between JQuery and Ajax. **4**
 ii. What are the different tasks or operations that jQuery can do? **6**
 OR iii. What is jQuery UI? Explain in brief? **6**
- Q.6 Attempt any two:
 i. What is MEAN Stack? Explain with features. **5**
 ii. Write command to set up server side-Node.js and Express. **5**
 iii. Write short notes on following: **5**
 (a) Database MongoDB
 (b) Routing Guard

Marking Scheme

Web technologies and Frameworks-BC3CO56(T)

Q.1	i)	Which of the correct statement about JavaScript?	1	OR	iii.	Explain- Compare- Explain Following?	3 Marks 3 Marks	6
		a) JavaScript is an Object-Based language				A).Node.js-	2 Marks	
		b) Advertises incredible depth				B).AngularJS-	2 Marks	
	ii)	What is the purpose of the Dojo framework?	1		Q.3	i.	What are the modules in Node.js? Explain.	3
		b) Advertises incredible depth						
	iii)	The fs module stand for?	1					
		b). File System					1.5 Marks	
	iv)	To install the Node.js express module we have to use which command	1				1.5 Marks	
		a). \$ npm install express						
	v)	What is a Model in MVC?	1			ii.	Explain RESTFul API, scaling and Packaging?	7
		a) the lowest level of the pattern responsible for maintaining data		OR	iii.	Explain- RESTFul API- scaling - Packaging-	3 Marks 2 Marks 2 Marks	7
	vi)	Which of the following statement is correct about data binding in AngularJS?	1					
		a) Automatic synchronization of data between model and view components						
	vii)	What does the min mean in the following JavaScript code?	1			Q.4	i.	What is Angular JS ? Explain With its uses?
		<code><script src="jquery-1.4.2.min.js"></script></code>						
		a) Minimised version						
	viii)	Which of the following is a single global function defined in the jQuery library?	1				ii.	Explain MVC with its Component in brief?
		a) jQuery()						
	ix)	Which of the following contains strong models for URL routing (mapping an incoming URL to a server function), and manages HTTP requests and responses?	1	OR	iii.	Explain Following? A.Directives- B.Factories- C.Dependency Injection-	6	
		b). Express						
	x)	The M in MEAN stack stands for ____.	1					
		c). MongoDB						
Q.2	i.	Explain JavaScript Frameworks in brief?	4		Q.5	i.	Explain Difference between JQuery and Ajax?	4
		Explain- 4Marks						
	ii.	Explain type of JavaScript framework and compare it?	6			ii.	What are the different tasks or operations that jQuery can do?	6
							Task- 6 Marks	

[3]

OR	iii.	What is jQuery UI? Explain in brief?	6
		Define-	3 Marks
		Explain-	3 Marks

Q.6

i.	What is MEAN Stack, explain with Features?	5
	Define-	2 Marks
	Explain Feature-	3 Marks
ii.	Write command to set up server side-Node.js and Express?	5
	Command -	5 Marks
iii.	Write Short notes on following	5
	A). Database MongoDB-	2.5 Marks
	B). Routing Guard-	2.5 Marks
