END SEMESTER ASSESSMENT (ESA) - JULY - 2023

UE21CS242A - Web Technologies

Total Marks : 100.0

1.a. What is a protocol? Differentiate between HTTP and HTTPs   (4.0 Marks)

1.b. Explain the usage of checkbox and radio button in forms with example.

(6.0 Marks)

1.c. Create a table as shown in figure below with borders and caption as "Student Details"

(6.0 Marks)

Student Details

Name	Subject	Marks
Abhi Sharma	Physics	67
	Chemistry	82
	Maths	91

1.d.
Mention the steps required to add a hyperlink to an image

(4.0 Marks)

2.a. What is Event bubbling in DOM ?

(4.0 Marks)

2.b. Give an example for built in object in JavaScript.

(4.0 Marks)

2.c. Explain JQuery selectors.

(6.0 Marks)

2.d. Explain following HTML New tags with an example:
   1. Audio and Video tag
   2. Progress Bar

(6.0 Marks)

3.a.
Give an example for complex components in React.

(4.0 Marks)

3.b. Define Refs wrt React with an example.   (3.0 Marks)

3.c.
Write a note on stateless components

(3.0 Marks)

3.d. Explain 3 phases of Component Lifecycle. (6.0 Marks)

3.e. Create a class component which will render a H1 and paragraph element apply different inline style for H1 and P element created using java script objects (key value pair). (4.0 Marks)

4.a. Write a code snippet that reads from a file "test.txt" and writes the first 20 characters to the file "test20.txt" (Hint: You can use string methods). The code must appropriately handle the errors also. (6.0 Marks)

4.b.
What are the different kinds of events that can be fired by streams?
(4.0 Marks)

4.c. Differentiate between update and save query in MongoDB.　　(4.0 Marks)

4.d. Create a MongoDB database Company that has a collection Employee (name, ssn, age, salary etc). Write a Server code to Insert the documents and retrieve the same.　　(6.0 Marks)

5.a. What is RESTful API? Explain design specifications of RESTful API.　　(4.0 Marks)

5.b. Explain the role of express middleware function with an example　　(5.0 Marks)

5.c. How error handling is achieved in ExpressJS   (5.0 Marks)

5.d.
Explain how routing can be achieved in ExpressJS with the help of GET
method

(6.0 Marks)