Daffodil International University

Department of Computer Science and Engineering

Faculty of Science & Information Technology

Midterm Exam Examination, Summer 2021 @ DIU Blended Learning Center
Course Code: CSE417 (Day), Course Title: Web Engineering
Level: 4   Term: 1   Section: All
Instructor: SNA   Modality: Open Book Exam
Date: Wednesday 7 July, 2021   Time: 09:00am-11:30am
Two and half hours (2:30), Marks: 25

Part-A [3+3+3]

1. Suppose you are working as a system designer in a web development organization. You got a client who wants you to develop an online based examination management portal. Now, you are entitled to design the system based on the client's requirements. To decode the client's requirement, you have been allotted 10 min from your client. Therefore, you have to brief but understand the whole requirement process. Your CEO has asked you to give a set of questions that should not go beyond **five questions with an appropriate justification** for each question. List down five such questions with appropriate justification for why it's necessary and how it will help understand the system's workflow. [3]

2. Based on the elaborative scenario of question number 1, you have built the system based on the client's requirements. Before delivering the product, what will be the steps followed in furnishing the system to ensure no problems at the client's end and which testing will be appropriate? [3]

3. Based on the above scenario, what kind of http connection (Persistent/Non-Persistent) is appropriate or you can relate maximum? Justify your views. [3]

Part-B [8+8]

4. JavaScript/DOM: Write the JavaScript code and use the relevant HTML/CSS code also. We all know that good health is a state of complete physical, mental and social well-being. This means we need balanced diet, regular exercise and others necessary steps etc. So, we will know the story about a runner. Our target is to create a**" smart pace calculation chart"**. Now read the requirements carefully: -

Distance runners need to pace themselves to avoid burning out before the end of a long race. It's sometimes helpful to print out and carry a card which lists exactly what time the runner should reach each mile marker if they are running at their target pace. That way, if the runner reaches a mile marker at a time substantially off from the one listed, they know they are going too fast (or too slow) and need to adjust their pace accordingly. You will create a runner's pace chart based on entered values for distance and target pace:

The page consists of fields for entering a distance (in miles) and target pace (in minutes per mile), as well as create a table for the pace chart. Initially the table contains only a header row with the column names, and no. of data. For example, when the user clicks the Calculate button, it should first populate the table with data, and then show it or you can create another way. Design is your

choice but I am mentioning basic requirements for design sense; One is for Distance field; another one is for Targeted pace field and a button for calculation. Don't copy paste!! [8]

5. HTML/CSS: Create a web page from the class materials. You can only use the HTML, CSS and Grid CSS (will count maximum uses as well as good design). Avoid discussing with your friends. It may reduce your number if similarities are found. Be Careful!! [8]

Good Luck 😊! You can do it!!