

No. of Printed Pages : 4

**BCS-053**

**BACHELOR OF COMPUTER  
APPLICATIONS (BCA) (REVISED)**

**Term-End Examination**

**December, 2022**

**BCS-53 : WEB PROGRAMMING**

*Time : 2 Hours*

*Maximum Marks : 50*

*(Weightage : 75%)*

---

**Note :** *Question No. 1 is compulsory and carries 20 marks. Attempt any **three** questions from question no. 2 to question no. 5.*

---

---

1. (a) Write a JavaScript and related HTML code which changes the content of a paragraph having an id "IGNOU" from "BCA Examination" to the text "The out of distance education". 4
- (b) Explain the box model of HTML with the help of a diagram. 3

**P. T. O.**

- (c) Create an XML document having two records with the structure : 3
- **Name** which have first name and last name of a student.
  - **Programme** which is name of the programme of the student.
- (d) What is a cookie ? Why are the cookies used ? Write the code that can create a new cookie. 4
- (e) Write a JSP script that prints numbers 1 to 5 on a separate HTML paragraph. 4
- (f) List the advantages of JSP over Servlet. 2
2. (a) Explain the features of Web 2.0. Explain any *three* technologies of Web 2.0. 5
- (b) What is CSS ? Explain how CSS can be used for the following : 5
- (i) Change the background colour of a page to red.
  - (ii) Change the font size of a paragraph to 17 points.
  - (iii) Changes colour of a paragraph.

3. (a) What is a DTD in the context of an XML document ? Given the following DTD : 5

```
<!ELEMENT University (Name, Address)>
```

```
<!ELEMENT Name (# PCDATA)>
```

```
<!ELEMENT Address (Location, Pincode)>
```

```
<!ELEMENT Location (# PCDATA)>
```

```
<!ELEMENT Pincode (# PCDATA)>
```

Create a document having two records, which are valid as per the DTD given above.

- (b) Write the code in WML that creates the following table : 5

Course Name	Teacher
Web Programming	ABC
DBMS	XYZ

4. (a) Differentiate between the following : 6
- (i) GET and POST methods
  - (ii) HTTP server and Web container
  - (iii) Action elements and JSP implicit objects

(b) What is an exception ? What are the different types of errors in JSP ? Give *one* example of each. 4

5. Explain the following with the help of an example :  $2\frac{1}{2} \times 4 = 10$

- (a) DriverManager class
- (b) PreparedStatement() method
- (c) ResultSet object
- (d) MVC architecture