

INDIAN STATISTICAL INSTITUTE BANGALORE CENTRE
Documentation Research and Training Centre

M. S. (Library and Information Science) 2022-24
Second Year, Semester IV (Final)

Paper 17: Web Based Information Systems and Services
Date: 22nd Apr 2024

Duration: 3 hours

Full marks: 50

Answer any 5 questions. All questions carry equal marks.

1. Describe major features of CSS3, including rules of specificity and pseudo elements.
2. Write HTML code for displaying the following content:

Library Portal				
Quick Links <ul style="list-style-type: none">• Home• Catalogue• Policies• Contact [width: 25%]	New Arrivals			
	Sl. No.	Title	Author	Year
	1	Sample Title 1	Sample Author 1	2010
	2	Sample Title 2	Sample Author 2	2012
	3	Sample Title 3	Sample Author 3	2014
Contact Feedback				

3. Explain the difference between DTD and XML Schema.
4. Explain major types of SQL joins with examples.
5. Discuss the types and usage of database abstraction.
6. Write a DTD for which the following XML document will be valid:

```
<newArrivals>
  <record id="001">
    <title>The Algorithm Design Manual</title>
    <author>Steven S. Skiena</author>
    <publisher>
      <name>Springer</name>
      <year>2020</year>
    </publisher>
  </record>
  <record id="002">
    <title>The Unix Programming Environment</title>
    <author>Brian W. Kernighan</author>
    <author>Rob Pike</author>
    <keyword>Computer Science</keyword>
    <keyword lang="en">Programming</keyword>
  </record>
</newArrivals>
```

