

**GLS University**  
**Faculty of Computer Applications & Information Technology**  
**BCA SEM IV**  
**0301402: Introduction to XML**  
**Theory Assignment – 2**

**Q-1 Fill in the Blanks.**

1. The syntax of the DOCTYPE tag is \_\_\_\_\_.
2. The \_\_\_\_\_ keyword indicates that the conditional declarations inside this section are considered for validation.
3. The value of the standalone attribute in the XML tag is \_\_\_\_\_, if an XML document does not depend on external DTD
4. The two types of DTD are \_\_\_\_\_ and \_\_\_\_\_.
5. A \_\_\_\_\_ declaration in an XML document specifies that we want to include a reference to a DTD file.
6. An external DTD are of two types \_\_\_\_\_ and \_\_\_\_\_.
7. Choice can be specified by using \_\_\_\_\_ character.
8. The \_\_\_\_\_ keyword indicates that the attribute must appear inside the element.
9. String attributes are declared by using the \_\_\_\_\_ keyword.
10. \_\_\_\_\_ attributes specify certain restriction that get applied to the attributes values.
11. Tokenised attribute type \_\_\_\_\_ identifies reference to an element.
12. 3 types of attributes are \_\_\_\_\_, \_\_\_\_\_ and \_\_\_\_\_
13. \_\_\_\_\_ keyword specify that if the attribute doesnot appear in the element, the application using the XML document is free to decide the value for the attribute, or keep it empty
14. Tokenised attribute type \_\_\_\_\_ uniquely identifies an element.
15. An attribute declared as of type \_\_\_\_\_ could contain letters, digits, periods, underscores, hyphens and colon characters.
16. An \_\_\_\_\_ attribute allows us to specify the list or set of possible values that the attribute can have.

**Q-2 State True or False**

1. <?DOCTYPE root element name....> is the syntax of DOCTYPE tag.
2. The 2 types of DTD are System and Public
3. To specify that only text be allowed within an element, CDATA data type is used

4. The data type of the element is known as content specification.
5. ATTLIST is used to describe the attribute of an element.
6. FIXED keyword implies that an attribute should appear in an element.
7. The & character is used in the ELEMENT declaration to specify the allowable value for the element.
8. A DTD file may or may not have an extension.
9. When the ELEMENT is defined by using a mixed content model, the element cannot be empty.
10. The sub-element of an element that is declared as ANY must have its own datatype defined
11. An EMPTY element can contain text but no sub-element.
12. The enumerated attribute can be used to specify only 2 values to choose from.
13. One element can have only one ID attribute.
14. The parameter entities are used to include or ignore the part of the DTD declaration.
15. The keyword INCLUDE indicates that the conditional declarations inside this section are considered for validations.

**Q-3 Write a short note on the following**

1. Why do we need DTD?
2. What are the types of DTD? Explain with example.
3. How can we insert the comments in DTD?
4. Which keywords are used to declare elements and attributes in DTD?
5. List out the element content modeling DTD.
6. How do we specify the sequence, choice and frequency of an element? Explain with example.
7. What are attributes? How are they defined for an element?
8. How many types of attributes are possible?
9. Write a short note on the tokenized attribute. Explain with example.
10. What are conditional sections in a DTD? How are parameter entities used to define them?
11. List and explain the default values for attributes.
12. What are the limitations of DTD?
13. Define :
  - SYSTEM
  - PUBLIC
  - NMTOKEN
  - EMPTY
  - ANY
  - MIXED