

**CERTIFICATE IN INFORMATION
TECHNOLOGY (CIT)**

Term-End Examination

02404

December, 2019

**CIT-001 : FUNDAMENTALS OF COMPUTER
SYSTEMS**

Time : 2 hours

Maximum Marks : 50

(Weightage : 75%)

Note : Questions number 1 and 2 are compulsory.

Attempt any **three** questions from the rest.

1. There are ten *true/false* type questions below.
Write the correct answer in your answer
sheet. $10 \times 1 = 10$
- (a) Control Unit (CU) of a PC controls the
entire operations of a computer.
- (b) When CPU runs a program, it fetches the
program instructions directly from the
Hard Disk.
- (c) ASCII stands for American Standard Code
for Information Interchange.
- (d) DBMS does not help in removing duplicate
data from the database.

- (e) Double is a data type in C programming language.
- (f) While loop and do-while loop are same.
- (g) An algorithm must always terminate after a finite number of steps.
- (h) A bridge cannot be used to connect two LANs.
- (i) Ring topology is also known as circular topology.
- (j) Generally optical cable can transfer data at a higher rate compared to coaxial cable.

2. (a) Draw an ER-diagram for the following relations (with primary key underlined) :
- teacher (Emp_ID, tname, department, address)
 - student (Reg_No, sname, father name, course_code, programme, year)
 - class (tname, programme, department, Room_No, Emp_ID, course_code) 7
- (b) Draw a flow chart to convert temperature from Fahrenheit to Celsius. 3

3. List and describe briefly the types of threats which can breach the network security of an organization. 10

4. (a) List and describe the classification of printers on the basis of quality. 5
- (b) Define Algorithm. Write an algorithm to find the area of a rectangle. 5
5. (a) Differentiate between internal modem and external modem with examples. 5
- (b) What is computer virus ? How can you prevent your system from virus attacks ? 5
6. (a) Write a program in C language to find the average of three given numbers. 5
- (b) Explain switch statement of 'C' with the help of an example. 5
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