

BRIKS ACADEMY PADMANABHANAGARA 23-24 MODEL

PAPER

II PUC MODEL PAPER - 4

Time: 3:15mins.

Subject: COMPUTER SCIENCE

Max. Marks: 70

PART - A

Answer all the question. Each question carries one mark.

I. Select the correct answer from the choices given:

1X 20 =20

- Which of the following is not a secondary storage device?
a) floppy disk b) pen drive c) hard disk d) cache memory
- There are _____ minterms for three variables(a,b,c)
a) 6 b) 3 c) 8 d) 16
- The AND gate is represented algebraically by _____.
a) * b) & c) + d) %
- To find length of the array we use
a) $L = UB + LB - 1$ b) $L = LB - UB + 1$ c) $L = UB - LB + 1$ d) $L = UB - LB - 1$
- The data member of class defines _____.
a) variables b) characteristics of class c) behavior of the class d) all the above.
- The friend function must be defined _____.
a) Inside the class b) outside the class c) can be defined both inside and outside d) all the above.
- _____ is used to de-allocate memory that was allocated for the object by the constructor.
a) object b) delete c) constructor d) destructor
- If more than one class is derived from a single base class is called _____ inheritance.
a) multiple b) multilevel c) single d) hierarchical
- _____ operator is used to allocate memory for objects during run time.
a) constructor b) destructor c) new d) delete
- In the architecture of a database system external level is the _____.
a) view level b) logical level c) physical level d) conceptual level
- The _____ clause of select query allows us to select only those rows in the result satisfy a specified condition.
a) from b) where c) having d) like
- Identify the device used to boost up a weak signal _____.
a) bridge b) Gateway c) Router d) repeater
- The _____ is an example for a simplex device.
a) mobile b) walkie talkie c) TV d) telephone
- The founder of FSF or free software foundation is _____.
a) Richard stallman b) Tim Berners Lee c) Bruce perence d) Eric raymond.
- The tag which display the bullets _____.
a) b) c) d) none of the above

II Fill in the blanks choosing the appropriate word/words from those given in brackets.(Repeated answer will not be considered)

(data warehouse, normalization, data base, centralized database, relationship)

- A collection of logically related data organized in a way that data can be easily accessed managed and updated is called _____.
- Data sharing in database is because of _____.
- A _____ describes relation between entities.
- _____ is a repository of an organization electronically stored data.

20. _____ is the process of organizing the data in a database.

PART – B

III. Answer any FOUR of the following.

2 x 4 = 8

21. Explain the components of motherboard:
22. Mention and prove involution law.
23. Write the logic gate and truth table for OR gate.
24. What is a stack? Write the applications of stack
25. Define primary key and foreign key.
26. List the goals of networking.
27. What is web browser? Mention any two web browsers.
28. Differentiate between get() and getline().

PART - C

IV. Answer any FOUR of the following.

3 x 4 = 12

29. Differentiate between ifstream and ofstream class.
30. Give the features of DHTML.
31. What is array of pointers? Give an example?
32. Prove algebraically $(x + y + z)(\bar{x} + \bar{y} + \bar{z}) = \bar{x}\bar{y}\bar{z}$.
33. Mention the three basic logic gates
34. What is a port? Explain serial and parallel port.
35. What are the advantages of WWW.
36. What is traversal? Write an algorithm for traversal in linear array.

PART – D

V. Answer any SIX of the following.

5 x 6 = 30

37. Mention the applications of OOPs.
38. Write an algorithm to insert an element into an array.
39. Describe access specifiers in a class.
40. What are the advantages of inheritance.
41. Explain destructor with syntax and example
42. State and prove absorption laws algebraically .
43. What are the different communication modes? Explain
44. What are primitive data structures? Explain the operations performed on primitive data structures.

PART –E

VI Answer any two questions.Each question carries FIVE marks.

5 x 2 = 10

45. Given the Boolean function $f(A,B,C,D)=\pi(1,5,9,10,11,12,13,14)$, reduce using K-MAP.
46. Write the difference between order by and group by with example.
47. Explain friend function and their characteristics.

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