

B. Sc. DEGREE END SEMESTER EXAMINATION - MARCH 2025**SEMESTER 4 : COMPUTER APPLICATION****COURSE : 19U4CRCAP8 : DATABASE MANAGEMENT SYSTEM***(For Regular 2023 Admission and Improvement /Supplementary 2022/ 2021/2020/ 2019 Admissions)*

Time : Three Hours

Max. Marks: 75

PART A**Answer All (1 mark each)**

1. What is transitive dependency ?
2. Define incorrect summary problem.
3. What you mean by domain constraints?
4. Define domain.
5. What you mean by Database audit?
6. What you mean by network data model?
7. What is the responsibility of database designer?
8. State Augmentation rule.
9. Define views.
10. What is an entity relationship model?

(1 x 10 = 10)**PART B****Answer any 8 (2 marks each)**

11. Differentiate Procedural DML and Non Procedural DML.
12. Explain the use of UPDATE command with syntax and example.
13. What are the database access operations of a transaction?
14. What is Relational Instance & Relational Schema? Give one examples.
15. What is the use of INSERT command? Explain with syntax and example.
16. What is meant by multivalued dependency? Explain with example.
17. What do you meant by secondary index ?
18. What do you meant by Relational Data model?
19. Define i) super key ii) candidate key iii) primary key.
20. What is Data Abstraction? Explain the different views of data.

(2 x 8 = 16)**PART C****Answer any 5 (5 marks each)**

21. Explain about the different problems occurred when transaction executed concurrently.
22. State DDL commands.
23. Explain about Full functional dependency and Partial dependency.
24. Explain about database languages with examples.
25. Prove that any relation schema with two attributes is BCNF.
26. Explain the different types of integrity constraints.
27. Draw the Architecture of Database and explain.

(5 x 5 = 25)

PART D

Answer any 2 (12 marks each)

28. Define normalization. List and explain different normal forms with examples.
29. What is the use of ER diagram? Draw an ER diagram for a banking enterprise.
30. Draw a relational schema diagram of a college database.
31. Explain various DML commands with syntax and examples.

(12 x 2 = 24)