ROLL No: [ ][ ][ ][ ][ ][ ][ ][ ][ ][ ][ ][ ] Total number of pages:1

Total number of questions:06

B.Tech. || CSE || 5TH Sem
Database Management System (DBMS)
Subject Code:BTCS 502A
Paper ID:

Time allowed: 3 Hrs Max Marks: 60

Important Instructions:
- All questions are compulsory
- Assume any missing data

PART A (2×10)

Q. 1. Short-Answer Questions:
(a) What is logical data independence??
(b)Give two examples of DDL statements.
(c)Explain concept of time stamp in database.
(d)What is dirty read problem? How is it handled?
(e)Define alternate keys.
(f) Differntiate between roles of DBA and DA.
(g)Explain deadlocks briefly..
(hWhat is physical data independence?
(i)Explain concept of indexing.
(j)Give two examples of DML statements.

PART B (8×5)

Q. 2. What are various normal forms used in relational database.

Q. 3. Explain in detail entity types, attributes and keys in database.

Q. 4. How Concurrency control is implemented in database.
OR
What are ACID properties of transactions?

Q. 5. What are advantages and disadvantages of distributed database systems. Give appropriate example with ER diagram of each case.

Q 6. What are different issues concerned with database security? What are different measures taken to ensure protection of data?.