K20U 1816 Reg. No.:.... Name : III Semester B.Sc. Degree CBCSS (OBE) - Regular Examination, November 2020 (2019 Admission Only) General Awareness Course in Computer Science 3A12CSC: DATABASE MANAGEMENT SYSTEMS Max. Marks: 40 Time: 3 Hours PART- A (Short Answer) $(6 \times 1 = 6)$ Answer all questions. 1. What is a Database System? Define Schema. Define secondary key. Give the syntax for creating a table in SQL. 5. Define weak entity. 6. How is 2NF different from 1NF? PART - B (Short Essay) $(6 \times 2 = 12)$ Answer any six questions. 7. Who is a Database administrator? 8. What is the difference between logical and physical data independence ? 9. What is a subquery? Explain sequences.

11. What is cardinality and degree of a table ?

14. Give any two datatypes in SQL.

13. Can you change the structure of a table ? If so, how ?

P.T.O.

12. What is drop table ?



PART – C (Essay)

Answer any four questions.

 $(4 \times 3 = 12)$

- 15. Compare different levels of abstraction in DBMS.
- 16. Explain integrity constraints.
- 17. Discuss hierarchical data model.
- 18. Discuss TCL.
- 19. Explain any three SQL functions.
- 20. Explain the categories of database users.

PART - D

(Long Essay)

Answer any 2 questions.

 $(2 \times 5 = 10)$

- 21. Explain the purpose of DBMS.
- 22. Draw an ER diagram for a library management system.
- 23. Explain Relational Calculus.
- 24. Create a table student with rollno, name, sex and marks as attributes. (Rollno is the primary key). Write queries for
 - 1) Insert records.
 - 2) Sort students based on mark.
 - 3) Display the highest mark.