

**ST. ANN'S COLLEGE OF ENGINEERING & TECHNOLOGY: CHIRALA
DEPARTMENT OF COMPUTERSCIENCE & ENGINEERING**

LECTURE SCHEDULE

SUBJECT: DATABASE MANAGEMENT SYSTEMS

ACADEMIC YEAR: 2019-20

NAME: A YUGANDHAR REDDY

YEAR & SEM/SECTION: III-I-A

NO. OF LECTURES PER WEEK: 5+1* (TUTORIAL)

SL.NO	DATE	UNITS	TOPICS
1	10/6/19	I	An Overview of Database Management , Introduction- What is Database System-What is Database-Why Database
2	12/6/19		Data Independence- Relation Systems and Others- Summary,
3	13/6/19		Database system architecture,
4	13/6/19		Tutorial
5	14/6/19		Introduction- The Three Levels of Architecture-The External Level
6	15/6/19		the Conceptual Level- the Internal Level
7	17/6/19		Mapping
8	19/6/19		the Database Administrator
9	19/6/19		Tutorial
10	20/6/19		Database Management Systems- Client/Server Architecture.
11	21/6/19		Revision through PPT
12	22/6/19		UT-1
13	24/6/19	II	The E/R Models, The Relational Model, Relational Calculus , Introduction to Database Design, Database Design
14	26/6/19		Er Diagrams-Entities Attributes, and Entity Sets-Relationship and Relationship Sets
15	26/6/19		Tutorial
16	27/6/19		Conceptual Design With the Er Models,
17	28/6/19		The Relational Model Integrity Constraints Over Relations- Key Constraints
18	29/6/19		Foreign Key Constraints-General Constraints,
19	1/7/19		Relational Algebra and Calculus
20	3/7/19		Relational Algebra - Selection and Projection- Set Operation
21	3/7/19		Tutorial
22	4/7/19		Renaming – Joins- Division- More Examples of Queries,
23	5/7/19		Relational Calculus , Tuple Relational Calculus
24	6/7/19		Domain Relational Calculus.
25	8/7/19		Example queries on SQL,RA,TRC,DRC
26	10/7/19		Example queries on SQL,RA,TRC,DRC
27	10/7/19		Tutorial
28	11/7/19		Revision through PPT
29	12/7/19		Revision through PPT
30	15/7/19		UT-2
31	17/7/19	III	Queries, Constraints, Triggers: The Form of Basic SQL Query
32	17/7/19		Tutorial
33	18/7/19		Union, Intersect, and Except,
34	19/7/19		Nested Queries,
35	20/7/19		Aggregate Operators,
36	22/7/19		Null Values,
37	24/7/19		Complex Integrity Constraints in SQL
38	24/7/19		Tutorial
39	25/7/19		Triggers, Active Database.
40	26/7/19		Revision through PPT

41	27/7/19		Revision through PPT
42	31/7/19	IV	Schema Refinement (Normalization) : Purpose of Normalization or schema refinement,
43	31/7/19		Tutorial
44	1/8/19		concept of functional dependency,
45	2/8/19		Armstrong's axioms, Lossless join decomposition
46	3/8/19		Revision
47	5/8/19		MID1
48	7/8/19	Mid-1(Revision)	
49	7/8/19	Mid-1(Revision)	
50	8/8/19	Mid-1(Revision)	
51	9/8/19	Mid-1(Revision)	
52	10/8/19	Mid-1(Revision)	
53	14/8/19	IV	normal forms based on functional dependency(1NF, 2NF and 3 NF),
54	14/8/19		Tutorial
55	16/8/19		Concept of surrogate key, Boyce-codd normal form(BCNF),
56	17/8/19		Dependency preserving decomposition, Fourth normal form(4NF).
57	19/8/19		Revision through PPT
58	21/8/19		UT-4
59	21/8/19		Tutorial
60	22/8/19	V	Transaction Management and Concurrency Control: Transaction, properties of transactions, transaction log,
61	26/8/19		Transaction management with SQL using commit rollback and save point.
62	28/8/19		Concurrency control for lost updates, uncommitted data
63	29/8/19		Inconsistent retrievals
64	30/8/19		Scheduler.
65	31/8/19		Concurrency control with locking methods : lock granularity
66	4/9/19		lock types
67	4/9/19		Tutorial
68	5/9/19		two phase locking for ensuring serializability,
69	6/9/19		deadlocks,
70	7/9/19		Concurrency control with time stamp ordering
71	11/9/19		Wait/Die and Wound/Wait Schemes,
72	11/9/19		Tutorial
73	12/9/19		Database Recovery management: Transaction recovery.
74	13/9/19		Revision through PPT
75	16/9/19		Revision through PPT
76	18/9/19		UT-5
77	18/9/19		Tutorial
78	19/9/19	VI	Overview of Storages and Indexing, Data on External Storage
79	20/9/19		File Organization
80	21/9/19		and Indexing – Clustered Indexing – Primary and Secondary Indexes,
81	23/9/19		Index Data Structures, Hash-Based Indexing
82	25/9/19		Tree-Based Indexing
83	25/9/19		Tutorial
84	26/9/19		Tree-Based Indexing
85	27/9/19		Comparison of File Organization
86	28/9/19		Revision through PPT
87	30/9/19		Revision through PPT
88	3/10/19		

89	4/10/19	REV	Revision
90	5/10/19		Revision
91	7/10/19	MID-2	Mid-2(Revision)
92	9/10/19		Mid-2(Revision)
93	9/10/19		Mid-2(Revision)
94	10/10/19		Mid-2(Revision)
95	11/10/19		Mid-2(Revision)
96	12/10/19		Mid-2(Revision)

TEXT BOOKS:

1. Introduction to Database Systems, CJ Date, Pearson
2. Data base Management Systems, Raghurama Krishnan, Johannes Gehrke, TATA McGraw Hill 3rd Edition
3. Database Systems - The Complete Book, H G Molina, J D Ullman, J Widom Pearson

REFERENCE BOOKS:

1. Data base Systems design, Implementation, and Management, Peter Rob & Carlos Coronel 7th Edition.
2. Fundamentals of Database Systems, Elmasri Navrate Pearson Education
3. Introduction to Database Systems, C.J.Date Pearson Education

Signature of the Faculty

Signature of the HOD