SCHEME OF COURSE WORK

Course Details:

Course Title	: ADBMS & Operating Systems Lab			
Course Code	: 13CS2109	L T P C		:0 0 3 2
Program:	: M.Tech.			
Specialization:	: Computer Science Engineering			
Semester	:Ist Semester			
Prerequisites	: Data base management systems, Distributed Databases			
Courses to which it is a prerequisite	: Data Ware Housing and Datamining.			

Course Outcomes (COs):

1	Apply the UNIX operating system commands in generating system call programming.
2	Apply the knowledge of operating system scheduling and deadlock algorithms in practical model.
3	Compile & asses various storage allocation mechanisms in SQL.
4	Analyze the usability of query operators and query functions to develop modules in PL/SQL programs.
5	Develop modules to apply security and accessibility features on relations.

Program Outcomes (POs):

A graduate of Computer Science engineering will be able to

1	Demonstrate knowledge in core subjects of Computer Science and Engineering and the ability to learn independently.
2	Will demonstrate the ability to solve problems relevant to industries and Research & Development.
3	Demonstrate the ability to design a Software application or a process that meets desired specifications within the realistic constraints.
4	Develop innovative thinking capabilities to promote research in several areas related to Computer Science and Engineering.
5	Familiar with modern engineering software tools and equipment to analyze Computer Science and engineering problems

6	Demonstrate the ability to collaborate with engineers of other disciplines and work on projects which require multidisciplinary skills
7	Will acquire project management and finance control abilities
8	Able to communicate effectively in both verbal and written forms
9	Updating knowledge in whatever field they work through lifelong learning
10	. Understanding of ethical and social responsibilities in global and societal contexts
11	Graduate will demonstrate the abilities to carry out tasks by working independently and also in a group of engineers
12	.Understand various Computer science applications in various broad areas of engineering and social management.

Course Outcome versus **Program Outcomes:**

COs	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12
CO-1					S							M
CO-2	S		S				M					
CO-3		M							S			M
CO-4	M					M						
CO-5			M									M

S - Strongly correlated, *M - Moderately* correlated, *Blank - No correlation*

Assessment Methods:	Assignment / Quiz / Seminar / Case Study / Mid-Test / End Exam

Teaching-Learning and Evaluation

Week	TOPIC / CONTENTS	Course Outcomes	TEACHING-LEARNING STRATEGY	Assessment Method & Schedule
1	Simulate mv	CO-1	▫ Lecture ▫ Demonstration	Mid Test1 (Week 9)
2	Simulate CP	CO-1	▫ Lecture / Discussion ▫ Case study	Mid Test1 (Week 9
3	Simulate ls	CO-1	▫ Lecture ▫ Case study	Mid Test1 (Week 9
4	Implement in C SJF	CO-2	▫ Lecture Case study	Mid Test1 (Week 9
5	Implement in C Round Robin	CO-2	▫ Lecture Case study	Mid Test1 (Week 9
6	Implement in C FCFS	CO-2	▫ Lecture Case study	Mid Test1 (Week 9
7	Implement in C Priority Scheduling	CO-2	▫ Lecture Case study	Mid Test1 (Week 9

8	Implement in C FIFO , LRU , LFU	CO-3	▫ Lecture Case study	Mid Test1 (Week 9
9	Implement in C Dead lock detection and Prevention.	CO-3	▫ Lecture se study	Mid Test1 (Week 9
10	Creation, altering and dropping of tables and inserting rows into a table (use constraints whilecreating tables) examples using SELECT command.	CO-3	▫ Lecture ▫ Discussion ▫ Case study	Mid Test2 (Week 18)
11	Queries (along with sub Queries) using ANY, ALL, IN, EXISTS, NOTEXISTS, UNION, INTERSET, Constraints.	CO-4	▫ Lecture Case study	Mid Test2 (Week 18)
12	Queries using Aggregate functions (COUNT, SUM, AVG, MAX and MIN), GROUP BY, HAVING and Creation and dropping of Views.	CO-4	▫ Lecture Case study	Mid Test2 (Week 18)
13	Creation of simple PL/SQL program which includes declaration section, executable section and exception – Handling section (Ex. Student marks can be selected from the table and printed for those who secured first class and an exception can be raised if no records were found)	CO-4	▫ Lecture Case study	Mid Test2 (Week 18)
14	Develop a program that includes the features NESTED IF, CASE and CASE expression. The program can be extended using the NULLIF and COALESCE functions.	CO-5	▫ Lecture Case study	Mid Test2 (Week 18)
15	Programs development using creation of procedures, passing parameters IN and OUT of PROCEDURES.	CO-5	▫ Lecture Case study	Mid Test2 (Week 18)
16	Develop programs using features	CO-5	▫ Lecture	Mid Test2

	parameters in a CURSOR, FOR UPDATE CURSOR, WHERE CURRENT of clause and CURSOR variables		Case study	(Week 18)
17	Develop Programs using BEFORE and AFTER Triggers, Row and Statement Triggers and INSTEAD OF Triggers.	CO-5	□ Lecture Case study	Mid Test2 (Week 18)
18	**Mid-Test 2**			
19/20	**END EXAM**			