CMR INSTITUTE OF TECHNOLOGY



Session wise Course Plan

Department of Information Science & Engineering

 ${\sf SEMESTER} \; : \; I \qquad \qquad {\sf NAME \, OF \, THE \, FACULTY} \; : Mr. \; {\sf Samrat \, Chowdhury}$

BRANCH : ALL DATE OF COMMENCEMENT : 01-08-2016 SUBJECT : Programming in C and Data structures DATE OF CLOSING : 09-11-2016

SUBJECT CODE: 15PCD13 CLASS STRENGTH: 61 NO OF HRS/WK: 7 TOTAL HRS: 68

Ses sion No	Chapter no (No of hrs planed for the chapter)	DATE	Topics planned for the session	Teaching Aids	Assign ments/ Tests planned for the chapter	Topics covere d As per plan
	-	1/8/2016	How to design the solution for a given problem. Example: Reverse of a given number.			
	-	2/8/2016	Design the solution for the problem: Find out the square roots of a given quadratic equation in the form: $ax^2 + bx + c = 0$.			
1	1/1	4/8/2016	Module 1: Introduction to C Language	Board, chalk, duster		
2	2/1	5/8/2016	Pseudo code solution to problem,	,,		
3	3/1	5/8/2016	Basic concepts of a C program	"		
4	4/1	6/8/2016	Basic concepts of a C program	"		
5	5/1	6/8/2016	Declaration, Assignment & Print statement	,,		
6	6/1	8/8/2016	Declaration, Assignment & Print statement	"		
7	7/1	9/8/2016	Types of operators with programs	,,		

8	8/1	11/8/2016	Expressions along with		
9	9/1	12/8/2016	Programs Programming examples and exercise	Board, chalk, duster	
10	10/1	12/8/2016	Programming examples and exercise.	,,	
11	11/1	16/8/2016	Mini Assessment Test	-	
12	12/1	17/8/2016	Type Conversion with examples.	Board, chalk, duster	
13	13/1	18/8/2016	Revision.	,,	
14	1/2	20/8/2016	Module 2: BRANCHING AND LOOPING: Introduction to Looping and Branching	Board, chalk, duster	
15	2/2	22/8/2016	Two way selection -if, if-else, Programming Examples	,,	
16	3/2	22/8/2016	Nested if- else Programming Examples	,,	
17	4/2	23/8/2016	cascaded if-else, switch statement,	,,	
18	5/2	23/8/2016	Programming Examples	,,	
19	6/2	24/8/2016	Ternary operator, Go to Statement	,,	
20	7/2	25/8/2016	Loops (For, do-while) Programming Examples	,,	
21	8/2	27/8/2016	While Loop, Programming Examples	,,	
22	9/2	28/8/2016	break and continue	,,	
23	10/2	29/8/2016	programming examples and exercises	,,	
24	12/2	30/8/2016	Mini Assessment Test	,,	
25	1/3		Module 3: Arrays, Strings and Functions: Introduction	,,	
26	2/3		ARRAYS AND STRINGS: Using an array, Programming Examples	,,	
27	3/3		Using arrays with Functions Programming Examples	,,	

28	4/3	Multi-Dimensional arrays, Programming examples	,,	
29	5/3	String: Declaring, Initializing, Printing and reading strings,	Board, chalk, duster	
30	6/3	Programming examples	,,	
31	7/3	strings manipulation functions, strings input	,,	
32	8/3	Strings output functions, programming examples	,,	
33	9/3	arrays of strings, programming examples		
34	10/3	programming examples and Exercises		
35	12/3	Introduction to functions, need of functions	,,	
36	13/3	Functions in C, function call, function definition, function declaration	,,	
37	14/3	Programming Examples on functions	,,	
38	15/3	Argument Passing, call by value, Call by reference, programs	,,	
39	16/3	Functions and program structure	Board, chalk, duster	
40	17/3	location of functions, programs	,,	
41	18/3	void and parameter less Functions	,,	
42	19/3	Recursion	,,	
43	20/3	programming examples and exercises	,,	
44	22/3	Mini Assessment Test	,,	
45	1/4	Module-4: Basic of Structures	,,	
46	2/4	Structures	,,	

47	3/	Company of E	••		\Box
	3/4	Structure with Functions	77		
48	4/4	Arrays of Structures	,,		
49	5/4	Structure Data Types	"		
50	6/4	Type Definition	,,		
51	7/4	Defining Files	,,		
52	8/4	Opening and Closing of Files	,,		
53	9/4	File Input	"		
54	10/4	File Output Operations	"		
55	11/4	Programming Examples	,,		
56	12/4	Mini assessment test			
57	1/5	Module- 5: Introduction to Pointers	,,		
58	2/5	Pointers and Address	,,		
59	3/5	Pointers and Functions Arguments,	"		
60	4/5	Pointers and Arrays,	,,		
61	5/5	Address Arithmetic,	,,		
62	6/5	Character Pointer and Functions,	,,		
63	7/5	Pointers to Pointer, Initialization of Pointers Arrays,	,,		
64	8/5	Dynamic Allocations Methods,	,,		
65	9/5	Introduction to Pre-processors	"		
66	10/5	Complier Control Directives	,,		
67	11/5	Primitive and Non Primitive Data Types,	,,	Assignm ent –V	

68	12/5	Definition and applications of	,,		
		Stacks, Queues			
69	13/5	Definition and applications of	,,		
		Linked Lists and Trees.			
70	14/5	Programming Examples	,,		
71	15/5	Mini Assessment test			

Literature:

			Publication information		
Book Type	Code	Author & Title	Edition // Publisher	ISBN#	
Text Book	TB1	Brain W. Kernighan and Dennis M. Richie: The C programming Language.	2 nd Edition, PHI, 2012.	10: 978-01-311- 0362-8 13: 978-01-311- 0362-7	
Text Book	TB2	Jacqueline Jones & Keith Harrow: Problem Solving with C.	1st Edition, Pearson 2011	13: 978-18-819- 9148-9 10: 978-18-819- 9148-2	
References	RB1	Vikas Gupta: Computer Concepts and C Programming.	Dreamtech Press 2013.	978-81-772-2998- 1	

Signature of faculty Signature of HOD Signature of Principal