ANNEXURE-5

MVN UNIVERSITY

Department of Computer Science and Engineering

Diploma in Engineering

Scheme And Syllabus

MVN University, Haryana

Department of Computer Science and Engineering

Diploma in Computer Science and Engineering

S. N o	Name of subject	Sub code	Teaching Schedule			Total	Credit	Internal	External	Total
			L	T	P					
1	Mathematics-I	AHL003-A	4	1	0	5	5	50	100	150
2	Physics-I	AHL001-A	4	1	0	5	5	50	100	150
3	Effective Communication in English-I	AHL005-A	3	1	0	4	4	50	100	150
4	Fundamental of Computers	CSL001-A	3	1	0	4	4	50	100	150
5	Chemistry	AHL010-A	3	1	0	4	4	50	100	150
	Basics of Electrical & Electronics Engineering	EEL010-A								
6	Chemistry Lab	AHP010-A	0	0	2	2	1	20	30	50
	Basics of Electrical & Electronics Engineering Lab	EEP010-A								
7	Engineering Drawing	MEP010-A	1	0	3	4	2	20	30	50
	Workshop	MEP020-A								
8	Language Communication-I	AHL007-A	3	0	0	3	NC	50	***	50
9	Physics-I Lab	AHP005-A	0	0	2	2	1	20	30	50
10	Fundamental of Computers Lab	CSP001-A	0	0	2	2	1	20	30	50
	Total		21	5	9	35	27	330	670	1000

MVN University, Haryana

Department of Computer Science and Engineering

Diploma in Computer Science and Engineering

S. No	Name of subject	Sub code	Teaching Schedule			Total	Credit	Internal	External	Total
			L	T	P					
1	Physics-II	AHL002-A	4	1	0	5	5	50	100	150
2	Mathematics-II	AHL004-A	4	1	0	5	5	50	100	150
3	Effective Communication in English-II	AHL006-A	3	1	0	4	4	50	100	150
4	Introduction to C	CSL002-A	3	1	0	4	4	50	100	150
5	Chemistry	AHL010-A	3	1	0	4	4	50	100	150
	Basics of Electrical & Electronics Engineering	EEL010-A								
6	Chemistry Lab	AHP010-A	0	0	2	2	1	20	30	50
	Basics of Electrical & Electronics Engineering Lab	EEP010-A								
7	Engineering Drawing	MEP010-A	1	0	3	4	2	20	30	50
	Workshop	MEP020-A								
8	Language Communication-II	AHL008-A	3	0	0	3	NC	50	***	50
9	Physics-II Lab	AHP002-A	0	0	2	2	1	20	30	50
10	Introduction to C Lab	CSP002-A	0	0	2	2	1	20	30	50
	Total		21	5	9	35	27	380	620	1000

Department of Computer Science and Engineering

Diploma in Computer Science and Engineering

Semester-III   **Annexure-5**

Sr. no	Course title	Paper code	Teaching schedule			Total hours	credit	Evaluation scheme		
			L	T	P			Internal	External	Total
1	Data Structures using C	CSL031-A	3	1	0	4	4	50	100	150
2	Operating System	CSL033-A	3	1	0	4	4	50	100	150
3	Software Engineering	CSL035-A	3	0	0	3	3	50	100	150
4	Computer Networks	CSL037-A	3	0	0	3	3	50	100	150
5	Discrete Structures	CSL039-A	3	1	0	4	4	50	100	150
6	Math III	AHL 033-A	4	1	0	5	5	50	100	150
7	Data Structures using C lab	CSP031-A	0	0	2	2	1	20	30	50
8	Operating System lab	CSP033-A	0	0	2	2	1	20	30	50
9	Language Communication-III	AHP031-A	1	0	2	3	NC	***	50	50
10	VAC-I	CSV031-A	0	0	2	2	NC	20	30	50
	Total		20	4	8	32	25	360	740	1100

MVN University, Haryana

Department of Computer Science and Engineering

Diploma in Computer Science and Engineering

Semester-I V

Sr. no	Course title	Paper code	Teaching schedule			Total hours	credit	Evaluation scheme		
			L	T	P			Internal	External	Total
1	Web Programming	CSL032-A	3	1	0	4	4	50	100	150
2	Object Oriented Programming with C++	CSL034-A	3	1	0	4	4	50	100	150
3	Computer Architecture and Organization	CSL036-A	3	1	0	4	4	50	100	150
4	Data Base Management System	CSL038-A	3	0	0	3	3	50	100	150
5	Advanced Networking	CSP042-A	0	0	4	4	2	50	100	150
6	Basics of EVS	AHL 034-A	2	0	0	2	2	20	30	50
7	Language Communication-IV	AHP032-A	1	0	2	3	NC	***	50	50
8	Web Programming lab	CSP032-A	0	0	2	2	1	20	30	50
9	Object Oriented Programming with C++ lab	CSP034-A	0	0	2	2	1	20	30	50
10	Data Base Management System lab	CSP038-A	0	0	2	2	1	20	30	50
11	Minor Project	CSP032-A	0	0	4	4	2	20	30	50
	Total		15	3	16	34	24	350	700	1050

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Department of Computer Science and Engineering

Diploma in Computer Science and Engineering

Sr. no	Course title	Paper code	Teaching schedule			Total hours	credit	Evaluation scheme		
			L	T	P			Internal	External	Total
1	Core Java	CSL061-A	3	1	0	4	4	50	100	150
2	Computer Graphics	CSL063-A	3	1	0	4	4	50	100	150
3	Computer Hardware and Maintenance	CSL065-A	3	0	0	3	3	50	100	150
4	Basics of .Net Technology	CSL067-A	3	0	0	3	3	50	100	150
5	Language Communication-V	AHL061-A	2	0	0	2	NC	***	50	50
6	Core Java lab	CSP061-A	0	0	2	2	1	20	30	50
7	Hardware and Maintenance lab	CSP065-A	0	0	2	2	1	20	30	50
8	Basics of .Net lab	CSP067-A	0	0	2	2	1	20	30	50
9	VAC-II	CSV061-A	0	0	2	2	NC	20	30	50
10	Project-I	CSP061-A	0	0	4	4	2	40	60	100
11	Industrial Training viva	CST042-A	0	2	0	2	2	40	60	100
	Total		14	4	12	30	21	360	690	1050

MVN University, Haryana

Department of Computer Science and Engineering

Diploma in Computer Science and Engineering

Semester-VI   **Annexure-5**

Sr. no	Course title	Paper code	Teaching schedule			Total hours	credit	Evaluation scheme		
			L	T	P			Internal	External	Total
1	Advanced .Net Technology	CSL062-A	3	0	0	3	3	50	100	150
2	Multi Media Technology	CSL064-A	3	0	0	3	3	50	100	150
3	Graph Theory	CSL066-A	3	0	0	3	3	50	100	150
4	Advanced Java	CSL068-A	3	0	0	3	3	50	100	150
5	Relational Data Base Management System	CSP072-A	0	0	4	4	2	20	30	50
6	Language Communication-VI	AHL062-A	2	0	0	2	NC	***	50	50
7	Seminar	CSS062-A	0	2	0	2	2	20	30	50
8	Advanced .Net lab	CSP062-A	0	0	2	2	1	20	30	50
9	Multi Media lab	CSP064-A	0	0	2	2	1	20	30	50
10	Advanced Java lab	CSP068-A	0	0	2	2	1	20	30	50
11	Project-II	CSP062-A	0	0	4	4	2	40	60	100
	Total		14	2	14	30	21	340	660	1000

CSL001-A	**Fundamental of Computers**	L	T	P	Cr
		3	1	0	4

<u>Objective</u>

Today is the era of Computer. This subject focuses on the introduction to Computers.

<u>Theory</u>

Note: Total five questions are to be attempted from Sections A & B.

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<u>SECTION – A</u>

<u>Unit 1: Introduction to Computer</u>

Elements of computer system, computer hardware and software; data – numeric data, alpha numeric data; contents of a program, processing.

<u>Unit 2: Computer and Devices</u>

Computer organization, block diagram of a computer, CPU, memory, Input devices; keyboard, mouse etc; output devices; VDU and Printer, Scanner, Plotter, Electrical requirements, inter-connections between units, connectors and cables.

<u>Unit 3: Memory Hierarchy</u>

Secondary storage; magnetic disks – tracks and sectors, optical disk (CD and DVD Memory), primary and secondary memory: RAM, ROM, PROM etc., Capacity; device controllers, serial port, parallel port, system bus, Exercises on file opening and closing; memory management; device management and input – output (I/O) management with respect of windows.

<u>SECTION – B</u>

<u>Unit 4: Operating system and its installation</u>

Installation concept and precautions to be observed while installing the system and software. Introduction about Operating Systems such as MS-DOS and Windows, Special features, various commands of MS- Word and MS-Excel.

<u>Unit 5: Networking</u>

Basics of Networking – LAN, WAN, Topologies.

Unit 6: Introduction to Internet

About the internet – server types, connectivity (TCP/IP, shell); applications of internet like: e-mail and browsing, Various Browsers like WWW (World wide web); hyperlinks; HTTP (Hyper Text Transfer Protocol); FTP (File Transfer Protocol).

Text books

1- Fundamentals of Computers and Programming with C by A. K. Sharma Dhanpat Rai publications
2- Fundamentals of Computer by V Rajaraman; Prentice Hall of India Pvt. Ltd., New Delhi
3- Computers Today by SK Basandara, Galgotia publication Pvt ltd. Daryaganj, New Delhi

Reference books

1- Beginning MS-Office 2010 by Guy Hart-Davis; Apress 2010
2- Internet for Every One by Alexis Leon and Mathews Leon; Vikas Publishing House Pvt. Ltd., Jungpura, New Delhi
3- Computer Fundamentals by PK Sinha; BPB Publication, New Delhi

CSP001-A	**Fundamental of Computers lab**	L	T	P	Cr
		0	0	2	1

Objective: To study and learn the concepts of Ms office and study various commands of word, excel and powerpoint.

List of Practical's:

Working with MS- Office:

MS-Word: Word Basics, Commands, Formatting, Text and Documents, Sorting, Mail Merge etc.

1- To prepare your Resume using MS Word

MS-EXCEL: Basic, Formatting, Functions, Creating Charts, Working with Graphics, Using worksheet as Databases.

1- To prepare the list of marks obtained by students in different subjects and show with the help of
   chart/graph.
2- Also find the average, minimum and maximum marks in each subject.

MS-POWER POINT: PowerPoint Basics, Creating Presentations, Slide show, working with Graphics.
1- Prepare a presentation explaining the facilities/infrastructure available in your college/institute.

MS-ACCESS: Creating tables, Creating Queries, Creating Forms and Report.
1- Create a database of books in the library and manipulate the database using different forms and reports.

Books:

1- Text: TATA MCGRAW HILL MS office book
2- Ref: MS-Office 2010

CSL002-A	**Introduction to C**	**L T P**	**Cr**
		3 1 0	**4**

Objective

This subject focuses better understanding and deeper knowledge of the basic features of the C programming language.

Theory

Note: Total five questions are to be attempted from Sections A & B.

SECTION – A

Unit 1

Introduction to any Operating System [Unix, Linux, Windows], Programming Environment, Write and Execute the first program, Introduction to the Digital Computer; Concept of an algorithm; termination and correctness. Algorithms to programs: specification, top-down development and stepwise refinement. Introduction to Programming, Use of high level programming language for the systematic development of programs. Introduction to the design and implementation of correct, efficient and maintainable programs, Structured Programming, Trace an algorithm to depict the logic, Number Systems and conversion methods

Unit 2

Standard I/O in "C", Fundamental Data Types and Storage Classes: Character types, Integer, short, long, unsigned, single and double-precision floating point, storage classes, automatic, register, static and external, Operators and Expressions: Using numeric and relational operators, mixed operands and type conversion, Logical operators, Bit operations, Operator precedence and associativity.

Unit 3

Conditional Program Execution: Applying if and switch statements, nesting if and else, restrictions on switch values, use of break and default with switch, Program Loops and Iteration: Uses of while, do and for loops, multiple loop variables, assignment operators, using break and continue, Modular Programming: Passing arguments by value, scope rules and global variables, separate compilation, and linkage, building your own modules.

SECTION – B

Unit 4

Arrays: Array notation and representation, manipulating array elements, using multidimensional arrays, arrays of unknown or varying size, Structures: Purpose and usage of structures, declaring structures, assigning of structures, Pointers to Objects: Pointer and

address arithmetic, pointer operations and declarations, using pointers as function arguments, Dynamic memory allocation, defining and using stacks and linked lists.

Unit 5
Sequential search, Sorting arrays, Strings, Text files, The Standard C Preprocessor: Defining and calling macros, utilizing conditional compilation, passing values to the compiler

Unit 6
The Standard C Library: Input/output : fopen, fread, etc, string handling functions, Math functions : log, sin, alike Other Standard C functions.

Text Books

1-- Let Us C by Yaswant Kanetkar : BPB Publication
2- Computer Fundamental & C programming by E. Balaguruswamy; MGH

Reference Books

1 Fundamentals of Computers and Programming with C by A. K. Sharma Dhanpat Rai publications
2- Computer Fundamental & C programming by J.B.Dixit ; University Science Press
3- Fundamentals of Computer by V Rajaraman; Prentice Hall of India Pvt. Ltd., New Delhi
4- Kernighan and Ritche, "The C programming Language", PHI. 1999.
5- Computers Today by SK Basandara, Galgotia publication Pvt ltd. Daryaganj, New Delhi
6- Hutchison, R., "Programming in C", McGraw Hill. 1999
7- Johnsonbaugh, R. and Kalin M., "Applications programming in C", PHI. 2000

Revised and w.e.f. from session 2013-14

CSP002-A	**Introduction to C lab**	L T P	Cr
		0 0 2	1

LAB:
Note: At least ten experiments are to be performed during the semester. At least eight experiments should be performed from the list of experiments. Two experiments may either be performed from the given list of experiments or may be designed by the concern faculty in consultation with H.O.D as per the scope of syllabus.

Objective: To understand the concepts of C programming language.

List of Experiments:

1-Write a program in C to print any message.
2-Write a program in C to check whether entered year is Leap year or not.
3-Write a program to check whether a number is even or odd.
4-Write a program in C find the Factorial of any number.
5-Write a program to print table of any number.
6-Write a program to find largest of three numbers.
7-Write a program to sort any 10 numbers using bubble sort.
8-Write a program to search an element from a given set of array using Linear Search
9-Write a program in C Transpose of 2D Array.
10- Write a program to make use of structure.

List of Value added Experiments:

1.   WAP in C Print the given pattern
       1

       12

       123

       1234

       12345

   2. 1

       22

       333

       4444

       55555