

## Lesson Plan

Name of the Faculty : Sh. Neeraj Manlan

Discipline : Computer Engg.

Semester : VIth

Subject :- APPLICATION DEVELOPMENT USING WEB FRAMEWORK

Lesson Plan Duration :- 15weeks (from 15Jan 2026 to 30 April 2026)

Work load (Practical) per week (in hours) :- Practical-6

Note:- GI and GII are the respective Groups of students

Week	Practical I	
	Practical Group	Topic
Week 1	G-I	Practice on HTML, CSS, Java Script
	G-II	Practice on HTML, CSS, Java Script
	G-I	Practice on Ajax.PHP & MySql
	G-II	Practice on Ajax.PHP & MySql
Week 2	G-I	Install WordPress & Create Blogs
	G-II	Install WordPress & Create Blogs
	G-I	Practice
	G-II	Practice
Week 3	G-I	Manage blogs features e.g. Images, Text Around Images, Comments, Post Formats, Linking, Pages, Categories, Smilies,Feeds, Gravatars, Password Protection
	G-II	Manage blogs features e.g. Images, Text Around Images, Comments, Post Formats, Linking, Pages, Categories, Smilies,Feeds, Gravatars, Password Protection
	G-I	Manage blogs features e.g. Images, Text Around Images, Comments, Post Formats, Linking, Pages, Categories, Smilies,Feeds, Gravatars, Password Protection
	G-II	Manage blogs features e.g. Images, Text Around Images, Comments, Post Formats, Linking, Pages, Categories, Smilies,Feeds, Gravatars, Password Protection
Week 4	G-I	Practice / viva
	G-II	Practice / viva
	G-I	Practice various designing features: Colour Scheme, Headers,CSS Horizontal Menus, Dynamic Menu, Highlighting, Navigation Links, Print
	G-II	Practice various designing features: Colour Scheme, Headers,CSS Horizontal Menus, Dynamic Menu, Highlighting, Navigation Links, Print
Week 5	G-I	Practice various designing features: Colour Scheme, Headers,

		CSS Horizontal Menus, Dynamic Menu, Highlighting, Navigation Links, Print
	G-II	Practice various designing features: Colour Scheme, Headers, CSS Horizontal Menus, Dynamic Menu, Highlighting, Navigation Links, Print
	G-I	Read More, Formatting Date and Time, Finding CSS Styles, Creating Individual Pages
	G-II	Read More, Formatting Date and Time, Finding CSS Styles, Creating Individual Pages
Week 6	G-I	Uploading Files, Using WordPress Themes, Templates, TemplateTags, Template Hierarchy,
	G-II	Uploading Files, Using WordPress Themes, Templates, TemplateTags, Template Hierarchy
	G-I	Practice
	G-II	Practice
Week 7	G-I	Validating a Website, Know Your Sources, WordPress Site Maintenance
	G-II	Validating a Website, Know Your Sources, WordPress Site Maintenance
	G-I	Validating a Website, Know Your Sources, WordPress Site Maintenance
	G-II	Validating a Website, Know Your Sources, WordPress Site Maintenance
Week 8	G-I	Integrate PHP & MySql with WordPress
	G-II	Integrate PHP & MySql with WordPress
	G-I	Practice
	G-II	Practice
Week 9	G-I	Install Moodle & various plugins
	G-II	Install Moodle & various plugins
	G-I	Create a Moodle site and Database Schema
	G-II	Create a Moodle site and Database Schema
Week 10	G-I	Create a Moodle site and Database Schema
	G-II	Create a Moodle site and Database Schema
	G-I	Design Site appearance, Front page, Front page settings
	G-II	Design Site appearance, Front page, Front page settings
Week 11	G-I	My Moodle, User profiles, Navigation, Course list, Themes, Theme settings, Header and footer, Language settings
	G-II	My Moodle, User profiles, Navigation, Course list, Themes, Theme settings, Header and footer, Language settings
	G-I	Using web services, Publishing a course, Blogs, RSS feeds
	G-II	Using web services, Publishing a course, Blogs, RSS feeds
Week 12	G-I	Practice / viva
	G-II	Practice / viva
	G-I	Manage Moodle site, Managing authentication, Manual accounts, No login
	G-II	Manage Moodle site, Managing authentication, Manual accounts, No login
Week 13	G-I	Email-based self-registration, Account
	G-II	Manual accounts, No login, Email-based self-registration, Account

	G-I	Create Roles and permissions, Assign roles,
	G-II	Create Roles and permissions, Assign roles,
Week 14	G-I	Implement Password salting.
	G-II	Implement Password salting.
	G-I	Perform Site backup, Course backup
	G-II	Perform Site backup, Course backup
Week 15	G-I	Course restore, Automated course backup
	G-II	Course restore, Automated course backup
	G-I	Practice / viva
	G-II	Practice / viva

## Computer Engineering Department

**Session** : 2025-26  
**Faculty** : Mrs. Archana/Mrs. Neha Sharma  
**Semester** : 2<sup>nd</sup>  
**Subject** : Analog Electronics  
**Load** : Lectures-02, Practical-04

Week	Theory		Practical
	Lect ures	Topic	Topic
1 <sup>st</sup> (15Jan-16 Jan)	1	Semiconductors and Diodes: Conductors, Insulators, and Semiconductors. Electrons- free and valence. Energy band diagrams.	Basic electronic components
	2	Properties of semiconductors. Meaning of Hole current, electron-hole pairs, Recombination	
2 <sup>nd</sup> (19 Jan -23 Jan)	1	Doping, acceptor and donor impurities. Intrinsic and Extrinsic, N and P type semiconductors	Familiarity with CRO
	2	Diode- formation, depletion region	Familiarity with Multimeter, Function generator
3 <sup>rd</sup> (26 Jan-30 Jan)	1	Diode VI Characteristics, ratings, types and applications.	Familiarity with Regulated power supply, Active passive components, Bread Board
	2	Zener diode- reverse bias characteristics	Study of V-I Characteristics of a Diode
4 <sup>th</sup> (2Feb – 6Feb)	1	Voltage regulation, shunt voltage regulator, and applications.	Study of V-I Characteristics of a Diode
	2	Varistor and Thermistor working and applications.	Study zener diode characteristics
5 <sup>th</sup> (9 Feb – 13 Feb)	1	Revision of Unit 1	Study zener diode as voltage regulator
	2	Transistors and MOSFETs: Transistors- definition, terminals, types, symbols. Formation of NPN, PNP	Study the input characteristics of transistor in Common Base configuration
6 <sup>th</sup> (16 Feb – 20 Feb)	1	Transistor biasing- definition, importance	Study the input characteristics of transistor in Common Base configuration
	2	List types, stabilisation, thermal runaway, heat sink, cut off, saturation, and active Regions	Cut off, saturation and Active region of transistor
7 <sup>th</sup> (23Feb - 27 Feb)	1	Alpha and Beta- definitions, relation. Voltage divider method, Transistor as a Switch	Plot and study the output characteristics of BJT
	2	FET- definition, types. MOSFET- definition, types, symbols.	Revision
8 <sup>th</sup> (2Mar – 6 Mar)	1	N type enhancement mode- construction, working, characteristics, switch. List applications and ratings.	Study and draw the characteristics of FET in common source configuration
	2	Differentiate BJT and MOSFET.	Study and draw the characteristics of FET in common source conf
	1	Rectifiers, filters, and regulators: Regulated power supply- block diagram and applications. Rectifiers- definition,	Study and draw the characteristics of FET in common drain conf

9 <sup>th</sup> (9 Mar – 13 Mar)	2	half wave, centre tapped and bridge full wave rectifier, efficiency, ripple factor, PIV, ratings.	Study and draw the characteristics of FET in common drain conf
		Filters- definition, necessity and Regulators	Study and draw the characteristics of half wave rectifiers
10 <sup>th</sup> (16Mar- 20 Mar)	1		
	2	Sessional 2	Study and draw the characteristics of half wave rectifiers
11 <sup>th</sup> (23-27 Mar)	1	Amplifiers and Oscillators: Amplifier- definition, faithful amplification, classification based on configuration, power, and frequency	Study and draw the characteristics of rectifier filter circuit
	2	Transistor CE amplifier with biasing. Working of class A, B, C, and Push-pull amplifier.	Study and draw the characteristics of rectifier filter circuit
12 <sup>th</sup> (30 Mar- 3Apr)	1	Two-stage RC coupled amplifier working, gain in dB, frequency response.	Revision
	2	Feedback- definition, types, advantages and disadvantages, applications.	Study the Series and Shunt Voltage Regulator
13 <sup>th</sup> (6 Apr-10 Apr)	1	Oscillators-definition, classification, LC tank circuit, criteria.	Study the Series and Shunt Voltage Regulator
	2	RC phase shift and crystal oscillator- working, applications.	Study of Clipping & Clamping circuit
14 <sup>th</sup> (13Apr- 17Apr)	1	CRT- construction, working, and applications	Study of Clipping & Clamping circuit
	2	OP-AMP and Timers: OPAMP– definition, block diagram, operation, characteristics, applications, $\mu$ A 741 pin diagram.	Numerical Practice
15 <sup>th</sup> (20Apr- 24Apr)	1	. Definitions of virtual ground, CMRR and Slew rate.	Study of frequency response of active filters HP, LP & BP
	2	OPAMP applications– inverting, integrator, differentiator, summer, voltage follower, and comparator.	Study of frequency response of active filters HP, LP & BP
16 <sup>th</sup> (27Apr- 1May)	1	Filters- definition, Working- low pass, high pass passive and active filters,application	Numerical Practice
	2	Timers– block diagram, pin diagram of 555, duty cycle, time constant, applications. Multi-vibrators Astable and monostable using 555.	Numerical Practice

## Lesson Plan

**Name of Faculty:** Poonam Jain /Yudhvir Sharma  
**Discipline:** Computer Engg Semester: 4<sup>TH</sup>  
**Subject:** Data Structures Using C  
**Duration:** 16 Weeks (From 15 Jan to 1st May 2026)

Week	Theory		Practical	
	Lecture Day	Topic (including assignment/test )	Pr Day	Topic
15-16 Jan	1st	Problem solving concept, topdown And bottom up design	1	Program to create and traverse an array
	2nd	Structured programming Concept of datatypes, variables and constants		
	3rd	Concept of pointer variables and constants, Introduction to data Structure	2	Program for Inserting element in array at end
19-23 Jan	1st	Concept of Arrays, Single dimensional array, Two dimensiona l array	3	Deleting elements in array from end
	2nd	Representation of Two dimensional Array (Base Address, LB, UB)	4	Deleting elements in array from a particular position
	3rd	Operations on an array(searching traversing)		
26-30 Jan	1st	Operations on an array(inserting, deleting)	5	The addition of two matrices using functions
	2nd	Introduction to linked list and double linked list		
	3rd	Representation of linked lists in Memory, Comparison between LinkedList and Array	6	Sorting an array using bubble sort technique
2-6 Feb	1st	Linear Search algorithm, Binary Search algorithm	7	The linear search procedure to search an element in a list
	2nd	Traversing a linked list		
	3rd	Searching a singly linked list	8	The binary search procedure to search an element in a list
9-13 Feb	1st	Insertion, deletion into linkedlist (At firstNode, Specified Position, Last)	9	Implementing various operations on linked list
	2nd	Application of linked lists		
	3rd	Revision	10	The multiplication of two matrices.
16-20 Feb	1st	Sessional I	11	Viva-Voce/FileCheck
	2nd	<b>Test</b>	12	Sorting an array using insertion sort technique
	3rd	Sessional I		
23-27 <sup>th</sup> Feb	1st	Doubly linked lists	13	Implementing various operations on doubly linked list
	2nd	Traversing Doubly linkedlists		
	3rd	Insertion and deletion into doubly linked lists	14	

2-6 Mar	22nd	Introduction to stacks, Representation of stacks	15	Push and popoperation in stack
	23rd	Implementation of stacks		
	24th	Application of stacks:	16	Push and popoperation in stack
9-13 Mar	25th	Converting Infix to PostFixNotation	17	Conversion from in-Fix to postfix notation
	26th	Evaluation of PostFix Notation	18	Evaluate postfix notation
	27th	Recursion		
16-20 Mar	28th	Revision	19	The factorial of a given number using recursion
	29th	Sessional II		
	30th	Sessional II	20	Fibonacci Series using recursion
23-27 Mar	31st	Introduction to Queues Implementation of Queues	21	Insertion and Deletion of elements in queue FileCheck/Revision/Viva
	32nd	Circular Queues,		
	33rd	De-queues Application of Queues	22	Insertion and Deletion of elements in circular queue
30-3 Apr	34th	Concept of Trees	23	
	35th	Representation of Binary Tree in memory		
	36th	Traversing Binary Trees (Preorder, Post order and Inorder)	24	Traversing of tree (inorder, preorder, postorder)
6-10 Apr	37th	Inserting in binary search trees, deleting in binary search trees	25	Implementation of binary search tree operations
	38th	Concepts of sorting, Bubble Sort, Insertion Sort		
	39th	Selection Sort	26	Sorting an array using Selection sort technique
13-17 Apr	40th	Merge Sort,	27	Sorting an array using merge sort technique
	41st	Quick Sort		
	42nd	Heap Sort	28	Sorting an array using quick sort technique
20-24 Apr	43rd	Revision	29	Sorting an array using heap sort technique
	44th	Sessional III		
	45th	Sessional III	30	
27-1 May	43rd	Revision	29	FileCheck/Viva voce
	44th	Test		
	45th	Revision	30	FileCheck/Viva voce

**SUBJECT – EDM**  
**Subject Code -221643**  
**Name – Yogita / Nitika Gupta**  
**Branch – CE**  
**Semester-6<sup>th</sup>**  
**Session- 2025-26**

**Lecture as per study scheme: 3(T)**

<b>Week</b>	<b>L</b>	<b>Theory</b>
I	1	Entrepreneurship: Concept and definitions, classification and types of entrepreneurs,
	2	entrepreneurial competencies, Traits / Qualities of entrepreneurs, manager v/s entrepreneur,
	3	role of Entrepreneur, barriers in entrepreneurship,
II	1	Sole proprietorship and partnership forms of business organisations,
	2	small business vs startup, critical components for establishing a start-up,
	3	Leadership: Definition and Need, Manager Vs leader, Types of leadership
III	1	Definition of MSME, significant provisions of MSME Act, importance of feasibility studies
	2	technical, marketing and finance related problems faced by new enterprises, major labor issues in MSMEs and its related laws
	3	Obtaining financial assistance through various government schemes like PMEGP
IV	1	Pradhan Mantri Mudra Yogna (PMMY) , Make in India
	2	Start up India, Stand up India , National Urban Livelihood Mission (NULM)
	3	entrepreneurial support agencies at National, State, District level: NSIC, NRDC
V	1	DC:MSME, SIDBI, NABARD, Commercial Banks, SFC's TCO, KVIB, DIC
	2	Technology Business Incubator (TBI) and Science and Technology Entrepreneur Parks (STEP).
	3	Revision
VI	1	1 <sup>st</sup> Sessional
	2	Nature and Functions of Management: Definition, Nature of Management, Management as a Process, Management as Science and Art,
	3	Management Functions, Management and Administration, Managerial Skills, Levels of Management; Leadership.
VII	1	Planning and Forecasting - Meaning and definition, Features, Steps in Planning Process,
	2	Approaches, Principles, Importance, Advantages and Disadvantages of Planning,
	3	Types of Plans, Types of Planning, Management by Objective.
VIII	1	Decision Making-Meaning, Characteristics.
	2	Organising and Organisation Structure: Organising Process - Meaning and Definition
	3	Characteristics Process, Need and Importance, Principles, Span of Management,
IX	1	Organisational Chart - Types, Contents, Uses, Limitations, Factors Affecting Organisational Chart.

	2	STAFFING: Meaning, Nature, Importance, Staffing process. Manpower Planning, Recruitment
	3	Selection, Orientation and Placement, Training, Remuneration.
X	1	2 <sup>nd</sup> Sessional
	2	Controlling - Meaning, Features, Importance, Control Process,
	3	Characteristics of an effective control system, Types of Control
XI	1	Co-ordination - characteristics, essentials.
	2	Market Survey and Opportunity Identification
	3	Scanning of business environment, Assessment of demand and supply in potential areas of growth
XII	1	Project report Preparation, Detailed project report including technical, economic and market feasibility,
	2	Common errors in project report preparations, Exercises
	3	preparation of project report
XIII	1	3 <sup>rd</sup> sessional
	2	Revision
	3	Revision
XIV	1	Revision
	2	Revision
	3	Revision
XV	1	Revision
	2	Revision
	3	Revision

## Lesson Plan

Facility Name : UMA KANT / YUDHVIR

Discipline : Computer Engg.

Semester : 2ND

Subject : Advance in information technology

Lesson Plan Duration : 15 weeks (from 15 January 2026 to 30 April 2026)

Work Load (Lecture/Practical) per week (in hours): Lectures-03, Practical-04

Week	Theory		Practical	
	Lecture day	Topic	Practical week	Topic
1 <sup>st</sup>	1 <sup>st</sup>	UNIT I HTML Fundamentals Introduction to HTML- Characteristics of HTML language, Structure of a HTML page. Describing Tags.	1st	1. Creating an HTML document
	2 <sup>nd</sup>	How to create a HTML document? Viewing HTML document, commonly used web browsers. HTML4 – List of Tags in HTML4, HTML tags:.		
2 <sup>nd</sup>	3 <sup>rd</sup>	Container elements, empty elements. Using tags, Heading, Paragraph, Changing appearance of text (bold, italics, underline, subscript, superscript)	2nd	2. Working with Mark up Tags
	4 <sup>th</sup>	center tag, title tag. Changing font size, text color and background, Changing the background color and background of HTML page		
3 <sup>rd</sup>	5 <sup>th</sup>	Top marging, left margin, & nbsp, <hr> and its attributes	3rd	3. Working with Heading-Paragraphs
	6 <sup>th</sup>	Revision		
4 <sup>th</sup>	7 <sup>th</sup>	Test	4th	4. Working with Text 5. Working with Lists
	8 <sup>th</sup>	Working with HTML Using list and images: Unordered lists: type attribute. Ordered lists: start attribute, type attribute, value attribute.		
5 <sup>th</sup>	9 <sup>th</sup>	Nested lists. Inserting images, aligning an image, centering image, adding border to a image, alternate text,	5th	6. Working with Tables and Frames 7. Working with Hyperlinks 8. Working with Images
	10 <sup>th</sup>	setting height and width, adding space around the image. Working with links:		

		Anchor elements, creating hyperlink to a document.		and Multimedia 9. Working with Forms and controls.
6 <sup>th</sup>	11 <sup>th</sup>	Internal linking and external linking.	6th	10. Create a HTML form with Name, Password and Confirm Password Write a Java script to validate if Password and Confirm Password field values are same. 11. Write a Java script to animate a simple Image using set Timeout.
	12 <sup>th</sup>	Assignment		
7 <sup>th</sup>	13 <sup>th</sup>	Test	7th	12. Write a Java script to illustrate auto refreshing in your own Web page. 13. Develop a simple calculator using Java script.
	14 <sup>th</sup>	Designing with HTML Creating tables: Creating a table, attributes of table tag		
8 <sup>th</sup>	15 <sup>th</sup>	(BORDER, BORDERCOLOR, BGCOLOR, ALIGN, CELLSPACING, CELLPADING, WIDTH) Attributes of table row <tr> and table data <td>	8th	14. Write a Java script to illustrate the use of cookies in your own Web page. 15. Write a Java script to prompt two integer numbers from the user and display the sum of them.
	16 <sup>th</sup>	tag (BORDERCOLOR, BGCOLOR, ALIGN, VALIGN, HEIGHT). Row span and Col span. Working with Frames.		
9 <sup>th</sup>	17 <sup>th</sup>	Use and creating frames. Introduction to Forms Steps for developing a Website	9th	16. Write a Java script to greet the user with “Good Morning” or “Good Afternoon” or “Good Evening” depending on the current time.
	18 <sup>th</sup>	Assignment		
10 <sup>th</sup>	19 <sup>th</sup>	Test		17. Generate a Digital Clock using Java script.
	20 <sup>th</sup>	JAVA Script Overview and Core Language Features	10th	

11 <sup>th</sup>	21 <sup>st</sup>	Introduction to Scripting Languages, JavaScript Implementation-ECMAScript-DOM-BOM-Values-Variables-Literals-Constants-Operators a	11th	18. Write a Java script to change the background color of the image in definite time intervals
	22 <sup>nd</sup>	Expressions-Regular Expressions Conditional Branching Statements-Conditional Looping Statements-Functions		
12 <sup>th</sup>	23 <sup>rd</sup>	Creating Simple Java Script page-Adding JavaScript page into HTML	12th	Revision
	24 <sup>th</sup>	Assignment		
13 <sup>th</sup>	25 <sup>th</sup>	Test		Revision
	26 <sup>th</sup>	<b>Document Access</b> The Document Object Model: Mapping your HTML -Text Nodes-Attribute Nodes Accessing the Nodes you Want:	13th	
14 <sup>th</sup>	27 <sup>th</sup>	Finding an Element by ID-Finding Elements by Tag Name-Finding Elements by Class Name;	14th	Revision
	28 <sup>th</sup>	Navigating the DOM Tree-Interacting with Attributes - Changing Styles		
15 <sup>th</sup>	29 <sup>th</sup>	Changing Styles with Class and Id-Font-Table Layout-Text Properties- Padding, Borders and Margins	15th	Revision

### Lesson Plan

Faculty : Mrs.Pinki/Mrs.Renu Kandera  
 Discipline : Computer Engineering  
 Semester : 4th  
 Subject : Computer Organization & Architecture Lesson Plan  
 Duration : 5 Weeks (Jan 2026 to May 2026)

**Work Load(Lecture/Practical) per week(in hours) : Lectures-04,**

Week	Theory	
	Lecture day	Topic (including assignment/ test)
1st	1st	Hardware organisation of computer system CPU organisation : general register organisation
	2nd	Stack organisation
	3rd	Instruction formats(three address, two address, one address
	4th	Zero address and RISC instruction)
2nd	5th	Addressing modes: Immediate, register, direct, in direct, relative, indexed
	6th	CPU Design : Microprogrammed vs hard wired control
	7th	Reduced instruction set computers,;
	8th	RISC characteristics,
3rd	9th	CISC characteristics and their comparison with RISC
	10th	2. Memory organisation Memory Hierarchy
	11th	RAM Chips
	12th	ROM chips
4th	13th	Memory address map
	14th	Memory connections to CPU
	15th	Auxillary memory : Magnetic disks
	16th	magnetic tapes.
5th	17th	Associative memory
	18th	Cache memory, Virtual memory
	19th	Memory management hardware ,
	20th	Read and Write operation
6th	21st	Sessional test-I
	22nd	3. I/O organisation
	23rd	a. Basis Input output system(BIOS)
	24th	Function of BIOS Testing
	25th	Function of BIOS Testing and initialization

7 <sup>th</sup>	26 <sup>th</sup>	Configuring the system
	27 <sup>th</sup>	b. Modes of Data Transfer
	28 <sup>th</sup>	Programmed I/O
8 <sup>th</sup>	29 <sup>th</sup>	Synchronous, asynchronous and interrupt initiated.
	30 <sup>th</sup>	DMA data transfer
	31 <sup>st</sup>	4. Architecture of multi processor systems
	32 <sup>nd</sup>	Forms of parallel processing
9 <sup>th</sup>	33 <sup>rd</sup>	Parallel processing
	34 <sup>th</sup>	and pipelines
	35 <sup>th</sup>	basic characteristics of multiprocessor
	36 <sup>th</sup>	multiprocessors
10 <sup>th</sup>	37 <sup>th</sup>	General purpose multiprocessors'
	38 <sup>th</sup>	Interconnection networks
	39 <sup>th</sup>	time shared common bus
	40 <sup>th</sup>	time shared common bus
11 <sup>th</sup>	41 <sup>st</sup>	Sessional test-II
	42 <sup>nd</sup>	multi port memory
	43 <sup>rd</sup>	cross bar switch
	44 <sup>th</sup>	Switch in memory
12 <sup>th</sup>	45 <sup>th</sup>	multi stage switching networks
	46	hyper cube structures
	47	hyper cube structures
	48	switching networks revise
13 <sup>th</sup>	49	Introduction to I/O interface
	50	Types of I/O Interface
	51	Asynchronous Data Transfer
	52	Revise
14 <sup>th</sup>	53	Synchronous Data Transfer
	54	Strobe Control
	55	Difference between Asynchronous & Synchronous
	56	Serial Transfer
15 <sup>th</sup>	57	Handshaking Mechanism in DT
	58	Describe Asynchronous Serial Transfer

59	Revise
60	Sessional Test-III

**Name of the Faculty** : **Ms. Pinki /Ms. Renu**

**Discipline** : **Computer Engineering**

**Semester** : **2nd**

**Subject** : **Multimedia Applications**

**Lesson Plan Duration** : **15 weeks (Jan2026 to May2026)**

**Work Load (Lecture) per week (in hours): Lectures-02 and Lab-04**

Week	Theory		
	Lecture day	Topic (including assignment / test)	Practical
1st	1st	Introduction to Multimedia System; Components and tools of multimedia	Study of Adobe Flash Tool
	2nd	Applications of Multimedia	
2nd	3rd	Multimedia file audio/video format; Media, File Format and types of media files	Frame by Frame Animation
	4th	Basic Multimedia hardware and software requirements. Quality, criteria and specification of hardware component	
3rd	5th	Difference between Analog and Digital Signal	Motion Tweening
	6th	Modulation and Digital Recording; Search of Digital Recording by converting sound into numbers	
4th	7th	Sound Card Connection, History of Sound Card. Types of Sound Card; Area of computer to use sound card, advantages of external sound card	Shape Tweening
	8th	Function of Playback and recording, MIDI, Components of MIDI, MIDI Connectors, Features and working of MIDI	
5th	9th	Revision	Practice
	10th	Sessional 1	
6th	11th	Hardware Requirement for text	Single Layer Masking
	12th	Software Requirement for text	
7th	13th	Coloring of Text	Double Layer Masking
	14th	Fundamental Image Processing Steps	
8th	15th	Types of Image Processing	Adding Video Clips
	16th	Digital Image Editing	

<b>9th</b>	<b>17th</b>	Class Test	Movie Clip, Buttons
	<b>18th</b>	Animation Techniques	

<b>10th</b>	<b>19th</b>	Revision	Practice
	<b>20th</b>	Sessional 2	
<b>11th</b>	<b>21st</b>	Digital Video fundamentals	Publishing of Flash Movie
	<b>22nd</b>	Relationship between pixel and video bitrate	
<b>12th</b>	<b>23rd</b>	Steps to create high quality video	Study of Adobe Photoshop Tools
	<b>24th</b>	Digital Video Production Techniques	
<b>13th</b>	<b>25th</b>	Revision	Image Editing in Photoshop
	<b>26th</b>	Authoring Tools and their features	
<b>14th</b>	<b>27th</b>	Classification of Authorizing Tools	Applying Special Effects
	<b>28th</b>	Multimedia Project Planning and Costing	
<b>15th</b>	<b>29th</b>	Multimedia team	Practice
	<b>30th</b>	Sessional 3	

**Subject** MOOC ( Digital Marketing) Branch - CE  
**Name –** Yogita/ Nitika Gupta  
**Session** 15 Jan 2026-April 2026

**Lecture as per study scheme 2**

Week	Lecture	Topic (T) 2
I	1	Introduction to digital marketing and significance
	2	Traditional Vs Digital Marketing
II	1	Digital marketing process Web planning and development
	2	Types of websites , keywords,
III	1	Understanding domain and webhosting
	2	Building websites
IV	1	Introduction to search engine optimization,
	2	keywords Planner tools
V	1	Indexing and keyword placement
	2	content optimization
VI	1	I sessional test
	2	I Assignment
VII	1	Email marketing and importance
	2	Designing email marketin campaign
VIII	1	Building email list and signup forms
	2	Email marketing strategies and monitoring email automization
IX	1	Pay per click advertising , introduction and pay per click google adword
	2	Types of bidding strategies
X	1	Designig and monitoring search campaign
	2	Google anlytics , introductin and significance
XI	1	II Sessional test
	2	II assignment
XII	1	Social media Marketing, introduction and significance
	2	Facebook maketing introduction and significace
XIII	1	understanding facebook audiace and its types
	2	Twitter marketing basics, designing
XIV	1	Intoduction to linkedin maeketing
	2	Developing digital marketing strategies in integratio form

XV	1	III Sessional test
	2	III Assignment



## Lesson Plan

**Name of Faculty**  
**Discipline**  
**Semester**  
**Subject**  
**Lesson Plan Duration**

: Ria / Neha  
 : Computer Engg.  
 : 6th  
 : Network Security  
 : 16 weeks from January  
 2026 to May 2026

**Teaching Load: 02 Hours (lectures) 02 Hours per group (Practical's)**

Week	Theory		Practical Topic
	Lecture day	TOPIC	
1 <sup>st</sup> (15 Jan-16Jan)	1st	Need for securing a network	Installation of antivirus software
		Principles of security	
	2nd	Types of attacks	
		Introduction to cyber crime	
2 <sup>nd</sup> (19 Jan-23 Jan)	1st	Cyber law indian perspective(IT act 2000and amended 2008), Cyber ethics, Ethical hacking	Installation of antivirus software
	2nd	Skimming, hacking, Attacker,phreaker	
		Hactivist,bluejacking,bluesnarfing,IOS jailbreaking	
3 <sup>rd</sup> (26 Jan-30 Jan)	1st	Basic Encryption and Decryption	Installation of Firewall
	2nd	Symmetric &asymmetric key Cryptogtaphy	
4 <sup>th</sup> (2feb-6feb)	1st	Overview of DES,RSA	Installation of Firewall
	2nd	PGP,MD5,SSW	
		Inlriduction to hashing	
5 <sup>th</sup> (9 feb-13 feb)	1st	SSH,HTTPS,Ipsec	Study of firewall parameters
	2nd	Digital Signature, digital certification	
6 <sup>th</sup> (16feb-20 feb)	1st	<b>Sessional-1</b>	Study of firewall parameters
	2nd		
7 <sup>th</sup> (23feb)	1st	Definitions(virus,Worms and tryans)	Writing Program in c to
		Introduction to Preventive measures	

<b>- 27 Feb)</b>	2nd	Access control	encrypt using XOR key
<b>8<sup>th</sup>(2 mar- 6 mar)</b>	1st	Process Configuration , Virus scanners,	Writing Program in c to encrypt using XOR key

**Computer Engineering Department**  
**Session: Jan 2026 (4<sup>th</sup> Semester)**

**Name of Faculty :** Ria / Archana  
**Subject:** OOPs using Java  
**Work Load per Week:** Lecture- 02, Practical-04

WEEK	THEORY		Practical
1 <sup>st</sup> (15 Jan-16Jan )	LECT. DAY	TOPIC	TOPIC
1 <sup>st</sup> (15 Jan-16Jan )	1	Fundamentals of object oriented programming, Procedure oriented programming V/S object oriented programming (OOP)	Installation of JDK. Java compiler
	2	OOPS concepts–Classes ,object ,object reference , Abstraction, encapsulation, Inheritance, polymorphism	
2 <sup>nd</sup> (19 jan-23 Jan)	1	Introduction of eclipse(IDE)for developing programs in Java, variables, Types and type declarations, Data types	Write a program in JAVA to print “Hello” using classes
	2	Increment, Decrement operators Relational and logical operators	
3 <sup>rd</sup> (26 jan-30 jan)	1	If then else clause; conditional expressions	Write a program to input using Scanner Class.
	2	Input using scanner class and output statement	
4 <sup>th</sup> (2feb-6feb)	1	Loops, switch case, arrays, methods	Write a program to print factorial of a Number.
	2	Creation, Accessing class members,	
5 <sup>th</sup> (9 feb-13 feb)	1	Private Vs Public Vs Protected Vs Default , Constructors	To create a Class and make objects of that class.
	2	Object, Object Reference, Protected data, Public data, Constructor chaining	
6 <sup>th</sup> (16feb-20 feb)		<b>Sessional-1</b>	Revision
7 <sup>th</sup> (23feb-27 Feb)	1	Definition of inheritance, Order of invocation ,	Create a class with data members Feet, Inches and add them.
	2	Types of inheritance, Single inheritance	
8 <sup>th</sup> (2 mar-6 mar)	1	Hierarchical inheritance, Hybrid inheritance	Create a class using constructors.
	2	Method overloading, Constructor overloading ,	
9 <sup>th</sup> (9 Mar-13 mar)	1	Method overriding	Create a class and show the use of Single inheritance.
	2	Up-casting, Down-casting,	
10 <sup>th</sup> (16 Mar-20 Mar)		<b>Sessional-2</b>	Revision
11 <sup>th</sup> (23mar-27mar)	1	Key points of Abstract class	Create a class and show the use of multiple inheritances.
	2	Interface, Difference between an abstract class & interface,	
12 <sup>th</sup> (30 mar-3 apr)	1	Implementation of multiple inheritance through interface	

	2	Definition of exception handling,	
13 <sup>th</sup> (6 apr-10 apr)	1	Implementation of keywords like try, Catch, finally, Throw &Throws	Create a class and show the use of Multi-level inheritance.
	2	Importance of exception handling	
14 <sup>th</sup> (13 apr-17apr)	1	Revision	
	2	Revision	
15 <sup>th</sup> (20 Apr-24 apr)	1	<b>Sessional-3</b>	Create a program showing the use of Interfaces.
	2		
16 <sup>th</sup> (27 Apr- 01 may)	1	REVISION	Revision
	2	REVISION	

## Lesson Plan

Name of the Faculty : Pinki / Archana / Uma Kant / Yudhvir / Neha

Discipline : Computer Engg.

Semester : 6<sup>th</sup>

Subject : Project

Lesson plan duration : 15 weeks (From 15 Jan 2026 to 30 April 2026)

Week	Practical	
	Practical Day	Topic
1 <sup>st</sup> Week	1 <sup>st</sup> -G1	Selection of Project
	2 <sup>nd</sup> - G2	Selection of Project
Week 2	1 <sup>st</sup> -G1	Finalization of Project
	2 <sup>nd</sup> - G2	Finalization of Project
Week 3	1 <sup>st</sup> -G1	Outline of Project
	2 <sup>nd</sup> - G2	Outline of Project
Week 4	1 <sup>st</sup> -G1	Planning of Project
	2 <sup>nd</sup> - G2	Planning of Project
Week 5	1 <sup>st</sup> -G1	Execution of Project
	2 <sup>nd</sup> - G2	Execution of Project
Week 6	1 <sup>st</sup> -G1	Execution of Project
	2 <sup>nd</sup> - G2	Execution of Project
Week 7	1 <sup>st</sup> -G1	Execution of Project
	2 <sup>nd</sup> - G2	Execution of Project
Week 8	1 <sup>st</sup> -G1	Execution of Project
	2 <sup>nd</sup> - G2	Execution of Project

Week 9	1 <sup>st</sup> -G1	Execution of Project
	2 <sup>nd</sup> -G2	Execution of Project
Week 10	1 <sup>st</sup> -G1	Providing Solution of Problems
	2 <sup>nd</sup> - G2	Providing Solution of Problems
Week 11	1 <sup>st</sup> -G1	Production of Final Executed project
	2 <sup>nd</sup> - G2	Production of Final Executed project
Week 12	1 <sup>st</sup> -G1	Checking of Final Project
	2 <sup>nd</sup> - G2	Checking of Final Project
Week 13	1 <sup>st</sup> -G1	Report writing
	2 <sup>nd</sup> - G2	Report writing
Week 14	1 <sup>st</sup> -G1	Seminar
	2 <sup>nd</sup> - G2	Seminar
Week 15	1 <sup>st</sup> -G1	Viva-Voce
	2 <sup>nd</sup> - G2	Viva-Voce

## LESSON PLAN

LESSON PLAN		
Name of Faculty:	Poonam Jain / Uma Kant	
Discipline:	Computer Engg	
Semester:	6 <sup>th</sup>	
Subject:	Software Engineering	
Lesson Plan Duration:	15 weeks (from 15 January 2026 to 30 April 2026)	
Work load (Lecture /Practical) per week (in hours): Lectures—03		
		Theory
Week	Lecture	Topic (Including Assignment/ Test)
1 <sup>st</sup>	1	Introduction to Software Engineering , Programmes v/s Software Products
	2	Emergence of Software Engineering- Early Computer Programming, High-level Language Programming
	3	Control flow based Design, Data Structure Oriented Design, Object Oriented Design
2 <sup>nd</sup>	4	Revision and assignment topic
	5	Requirement of Life Cycle Model and general discussion about models
	6	Classical Waterfall Model
3 <sup>rd</sup>	7	Prototyping Model
	8	Evolutionary Model, Spiral Model
	9	Comparison of different Life Cycle Models with their advantage and disadvantage
4 <sup>th</sup>	10	Continue lecture 9
	11	Revision and assignment topic
	12	Class test/ Sessional
5 <sup>th</sup>	13	Software Planning general discussion
	14	Responsibilities of Software Project Manager
	15	Metrics for Project Size Estimation- LOC (Lines of Code).
6 <sup>th</sup>	16	Function Point Metric
	17	Project estimation Techniques- Using COCOMO Model
	18	Continue lecture 17
7 <sup>th</sup>	19	Halstead's Software Science
	20	Revision and assignment topic.
	21	Expert Lecture
8 <sup>th</sup>	22	Requirement Analysis and Specification
	23	Requirement gathering and Analysis
	24	Software Requirement Specifications (SRS)
	25	Formal Specification Technique

9 <sup>th</sup>	26	Characteristics of good SRS
	27	Revision and assignment topic
10 <sup>th</sup>	28	Class Test /Sessional -2
	29	Seminar-1
	30	Seminar-2
11 <sup>th</sup>	31	Software Design and Implementation Characteristics and features of good Software Design
	32	Cohesion and Coupling
	33	Software design Approaches- Function Oriented Design, Object Oriented Design
12 <sup>th</sup>	34	Structured Coding Techniques
	35	Coding Styles, documentation
	36	Revision and assignment topic
13 <sup>th</sup>	37	Software Testing Concept of Testing
	38	Verification v/s Validations, Unit Testing
	39	Black Box Testing.
14 <sup>th</sup>	40	White Box Testing
	41	Integration testing, System testing and differentiate all testing
	42	Revision and assignment topic
15 <sup>th</sup>	43	Software Quality and Maintenance Introduction to Capability Maturity Model
	44	ISO 9000 and Six Sigma
	45	Configuration Management