

TENTATIVE LESSION PLAN: MC2015

Course Title: OBJECT ORIENTED PROGRAMMING WITH JAVA		
Sem/Year : I/I	Date : 1/1/2022	Page No : 01 of 03
Revision No : 00	Prepared By : K.CHANDANA	Approved By : HOD

Tools : BB, PPTs

No. of periods	TOPIC	Date	Mode of Delivery
Unit-1: Basics of Object Oriented Programming (OOP)			
CO1: Understand the basic concepts of Java			
TB: "Java –The Complete Reference,7/e, Herbert Schildt, TMH"			
1	Introduction to C: Need for OO paradigm	3/1/2022	PPT, BB
2	A way of viewing world Agents, responsibility	4/1/2022	
3	Messages, methods	4/1/2022, 5/1/2022	
4	Classes and instances	6/1/2022, 7/1/2022	
5	Method binding, overriding and exceptions	8/1/2022, 10/1/2022	
6	Summary of OOP concepts, coping with complexity	11/1/2022, 12/2/2022	
7	Abstraction mechanisms	17/1/2022	
8	Java Basics: Data types, variables	18/1/2022, 19/1/2022	
9	Scope and life time of variables, arrays, operators, expressions	20/1/2022, 2/1/2022	
10	Control statements, type conversion and costing	22/1/2022, 24/1/2022	
11	Simple java program, classes and objects concepts of classes	25/1/2022, 27/1/2022	
12	Objects, constructors methods, access control	28/1/2022, 29/1/2022	
13	this keyword, garbage collection	31/1/2022	
14	Overloading methods and constructors	1/2/2022	
15	Parameter passing, recursion, string handling	2/2/2022	
16	Tutorial	3/2/2022	
UNIT-II: Inheritance			
CO2: Understand the concept of Inheritance, packages and interfaces			
TB: "Java-The complete reference,7/e, Herbert Schildt, TMH. "			
17	Hierarchical abstractions	4/2/2022	PPT, BB
18	Base class object, subclass, substitutability	5/2/2022	

No. of periods	TOPIC	Date	Mode of Delivery
19	Forms of inheritance- specialization	7/2/2022	
20	Specification, construction, extension	8/2/2022	
21	Limitation, combination, benefits of inheritance costs of inheritance	9/2/2022	
22	Member access rules, super uses, using final with inheritance	10/2/2022	
23	Polymorphism, abstract classes	11/2/2022	
24	Packages and Interfaces: Defining	12/2/2022	
25	Creating and Accessing a package	14/2/2022	
26	Understanding CLASSPATH, Importing packages	15/2/2022	
27	Differences between classes and interfaces	16/2/2022	
28	Defining an interface, Implementing interface	17/2/2022	
29	Applying interfaces variables in interface and extending interfaces	17/2/2022	
30	Tutorial	17/2/2022	
UNIT-III: Exception handling and Multithreading			
CO3: Understanding the usage of Threads			
TB:” Java-The complete reference,7/e, Herbert Schildt, TMH. “			
31	Concepts of exception handling, benefits of exception handling	18/2/2022	PPT,BB
32	Termination or presumptive models	18/2/2022	
33	Exception hierarchy, usage of try, catch	19/2/2022	
34	throws and finally, built in exceptions	19/2/2022	
35	Creating own exception sub classes	19/2/2022	
36	Differences between multi threading and multitasking.	28/2/2022, 2/3/2022	
37	Thread life cycle, creating threads,	3/3/2022, 4/3/2022	
38	Synchronizing threads, daemon threads	5/3/2022	
39	Thread groups	7/3/2022, 8/3/2022	
40	Tutorial	9/3/2022	
UNIT-IV: Event Handling			
CO4: Understand the concept of Event Handling and creation of User interface components			
TB:” Java-The complete reference,7/e, Herbert Schildt, TMH. “			
41	Events, Event sources	10/3/2022	PPT,BB
42	Event classes, Event Listeners	11/3/2022, 12/3/2022	
43	Delegation event model	14/3/2022,	

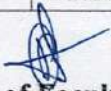
No. of periods	TOPIC	Date	Mode of Delivery
		15/3/2022	
44	Handling mouse and keyboard events	16/3/2022	
45	Adapter classes, inner classes.	17/3/2022, 19/3/2022	
46	User interface components- labels	21/3/2022	
47	Button, canvas, scrollbars,	22/3/2022	
48	Text components, check box, check box groups,	23/3/2022	
49	Choices, list panes- scroll pane	24/3/2022	
50	Dialogs, menu bar, graphics	25/3/2022	
51	Layout manager- layout manager	26/3/2022	
52	Types boarder, grid, flow	28/3/2022	
53	Card and grid bag	28/3/2022	
54	Tutorial	29/3/2022	


UNIT-V: Applets

CO5: Understand the concept of Applet creation and Swings Usage

TB:” JAVA: How to program, 8/e, Dietal , Dietal,PHI “

55	Applets: Concepts of Applet	30/3/2022	PPT, BB
56	Differences between applets and applications	31/3/2022	
57	Lifecycle of an applet, types of applets	1/4/2022	
58	Creating applets, passing parameters to applets	4/4/2022	
59	Swings: Introduction, limitations of AWT	5/4/2022	
60	MVC architecture, components	6/4/2022	
61	Containers, exploring swing	7/4/2022	
62	JApplet, JFrame and JComponent	8/4/2022	
63	Icons and Labels	9/4/2022	
64	Text fields, buttons- The JButton class	11/4/2022	
65	Check boxes, Radio Buttons, Combo boxes	12/4/2022	
66	Tabbed panes, Scroll panes,	13/4/2022	
67	Trees and Tables.	16/4/2022	
68	Tutorial	16/4/2022	


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**TENTATIVE LESSON PLAN – MCA11021
MASTER OF COMPUTER APPLICATIONS**

Course Title: BUSINESS COMMUNICATION		
Section : MCA	Date : 03-01-2022	Page No : 01 of 03
Revision No : 00	Prepared By : G. Praveen	Approved By : HOD

Tools : Black board, PPT, Videos

No. of Periods	TOPIC	Date	Mode of Delivery
UNIT- I: PURPOSE AND PROCESS OF COMMUNICATION			
CO1: To enable the students learn fundamentals of communication.			
TB1 : Mallika Nawal: “Business Communication”, Cengage Learning, New Delhi, 2012.			
TB2: Edwin A. Gerloff, Jerry C. Wofford, Robert Cummins Organisational Communication: The key stone to managerialeffectiveness.			
1.	Introduction	03-01-2022 04-01-2022	Lecture interspersed with discussions
2.	Objectives of Communication	06-01-2022 07-01-2022	
3.	Process of Communication	10-01-2022 11-01-2022	
4.	Types of communication	13-01-2022 17-01-2022	
5.	noise skills	18-01-2022 20-01-2022	
6.	listening skills	21-01-2022 22-01-2022	
7.	Types of listening, essentials of good listening and tips.	24-01-2022 25-01-2022	
8.	Types of listening, essentials of good listening and tips.	27-01-2022 28-01-2022	
UNIT- II : MANAGING ORGANIZATIONAL COMMUNICATION			
CO2: To enable the students understand different types of communications.			
TB1 : Mallika Nawal: “Business Communication”, Cengage Learning, New Delhi, 2012.			
TB2: Edwin A. Gerloff, Jerry C. Wofford, Robert Cummins Organisational Communication: The key stone to managerialeffectiveness.			
9.	Introduction	29-01-2022 31-01-2022	Lecture interspersed with discussions
10.	Organizational Communication	01-02-2022	
11.	Formal Communication	03-02-2022	
12.	Informal Communication	04-02-2022	
13.	Interpersonal Communication	05-02-2022	
14.	Inrarpersonal Communication	07-02-2022	
15.	Role of Emotion	08-02-2022	
16.	Maslow's Theory	10-02-2022	

17.	Barriers to Interpersonal Communication	11-02-2022	
18.	Exchange Theory	14-02-2022	
19.	Gateways for Effective Interpersonal Communication	15-02-2022	

UNIT III: NON-VERBAL COMMUNICATION AND BODY LANGUAGE

CO3 : To enable the students comprehend various aspects of Non – Verbal Communication.

TB1 : Mallika Nawal: “Business Communication”, Cengage Learning, New Delhi, 2012.

TB2: Edwin A. Gerloff, Jerry C. Wofford, Robert Cummins Organisational Communication: The key stone to managerialeffectiveness.

20.	Kinesics, Proxemics, Paralanguage	17-02-2022 18-02-2022 19-02-2022 21-02-2022	Lecture interspersed with discussions
21.	Haptics, handshakes	22-02-2022 24-02-2022 25-02-2022	
22.	appropriate body language and mannerisms for interviews:	26-02-2022 28-02-2022 03-03-2022	
23.	business etiquettes	04-03-2022 05-03-2022 07-03-2022	
24.	across different cultures.	08-03-2022 10-03-2022 11-03-2022	

UNIT – IV : WRITTEN COMMUNICATION

CO4 : To hone the correspondence skills of the students through letters, emails and reports

TB1 : Mallika Nawal: “Business Communication”, Cengage Learning, New Delhi, 2012.

TB2: Edwin A. Gerloff, Jerry C. Wofford, Robert Cummins Organisational Communication: The key stone to managerialeffectiveness.

25.	mechanics of writing	14-032022 15-03-2022	Lecture interspersed with discussions
26.	report writing	17-03-2022	
27.	report writing	18-03-2022	
28.	business correspondence	19-03-2022	
29.	business correspondence	21-03-2022	
30.	business letter format	22-03-2022	
31.	business letter format	24-03-2022	
32.	Meetings and managing meetings	25-03-2022	
33.	Resume writing	26-03-2022	
34.	Formats and Skills	28-03-2022	

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UNIT -V : PRESENTATION SKILLS

CO5: To Prepare the students for making effective professional presentation and to inculcate business etiquette and improve oral skills required for Professional interviews.

TB1 : Mallika Nawal: "Business Communication", Cengage Learning, New Delhi, 2012.

TB2: Edwin A. Gerloff, Jerry C. Wofford, Robert Cummins Organisational Communication: The key stone to managerialeffectiveness.

35	prerequisites of effective	29-03-2022 31-03-2022	Lecture interspersed with discussions
36	presentation, format of presentation	01-04-2022	
37	Assertiveness	04-04-2022	
38	strategies of assertive behavior	05-04-2022	
39	Communication skills for group discussion	07-04-2022	
40	Communication skills for Interviews	08-04-2022 11-04-2022	
41	Interview Techniques.	12-04-2022 16-04-2022	

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**TENTATIVE LESSON PLAN – MCA1102
MASTER OF COMPUTER APPLICATIONS**

Course Title: MATHEMATICAL AND STATISTICAL FOUNDATIONS		
Section : MCA	Date : 03-01-2022	Page No : 01 of 03
Revision No : 00	Prepared By : T.Prasanna	Approved By : HOD

Tools : Black board, PPT

No. of Periods	TOPIC	Date	Mode of Delivery
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UNIT- I: BASIC PROBABILITY AND RANDOM VARIABLES

CO1: To provide mathematical background and sufficient experience so that the student can read, write, and understand sentences in the language of discrete and Continuous Probability theory.

CO2: To introduce students to the basic methodology of “probabilistic thinking” and to apply it to problems.

TB1 :: PROBABILITY AND STATISTICS By Dr. T.V.K. Iyengar, S. Chand & Company Pvt. Ltd., 2014.

1.	Introduction to Random Experiments, Sample Spaces Events, the Concept of Probability the Axioms of Probability	03-01-2022	Lecture interspersed with discussions
2.	Some Important Theorems on Probability Assignment of Probabilities	04-01-2022	
3.	Conditional Probability Theorems on Conditional Probability, Independent Events	05-01-2022	
4.	Bayes Theorem or Rule, Problems	07-01-2022	
5.	Problems	07-01-2022	
6.	Random Variables, Discrete Probability Distributions, Distribution Functions for Random Variables	10-01-2022	
7.	Distribution Functions for Discrete Random Variables: Binomial Distribution-p.m.f, Properties, Problems	11-01-2022	
8.	Problems	12-01-2022	
9.	Poisson Distribution-p.m.f, Properties, Problems	17-01-2022	
10.	Problems	18-01-2022	
11.	Geometric Distribution-p.d.f, Properties, Problems	19-01-2022	
12.	Problems		
13.	Tutorial Class	21-01-2022	
14.	Distribution Functions for Continuous Random Variables: Uniform Distribution- p.d.f., properties, problems	21-01-2022	
15.	Exponential Distribution- p.d.f., properties, problems	22-01-2022	
16.	Problems		
17.	Normal Distribution- p.d.f., properties, problems	24-01-2022	
18.	Normal Approximation to Binomial distribution		
19.	Problems	25-01-2022	
20.	Gamma Distribution, Problems	28-01-2022	
21.	Weibull Distribution, Problems		

UNIT- II : SAMPLING AND ESTIMATION THEORY

CO3 The aim of this course is to cover sampling design and analysis methods that would be useful for research and management in many field. A well designed sampling procedure ensures that we can summarize and analyze data with a minimum of assumptions and complications.

TB1 : PROBABILITY AND STATISTICS By Dr. T.V.K. Iyengar, S. Chand & Company Pvt. Ltd., 2014.

22.	Population and Sample, Random Numbers Population Parameters Sample Statistics Sampling Distributions	28-01-2022	Lecture interspersed with discussions
23.	Statistical Inference Sampling With Replacement Problems	29-01-2022	
24.	Sampling Without Replacement Problems	31-01-2022	
25.	Frequency Distributions, Relative Frequency Distributions	01-02-2022	
26.	Mean, Median and Mode of the Frequency Distribution	02-02-2022	
27.	Computation of Mean, Variance, and Moments for Grouped Data	04-02-2022	
28.	Central Limit theorem	04-02-2022	
29.	Tutorial Class	05-02-2022	
30.	Sampling Distribution of Mean with Unknown Variance, Problems	07-02-2022	
31.	Sampling Distribution of Proportions, Problems	08-02-2022	
32.	t - distribution	09-02-2022	
33.	F- distribution	11-02-2022	
34.	Chi- Square Distribution	11-02-2022	
35.	Point Estimation, Maximum Error Estimate - Problems	14-02-2022	
36.	Interval Estimation - Problems	15-02-2022	
37.	Maximum Likelihood Estimates		

UNIT III: TESTS OF HYPOTHESIS AND SIGNIFICANCE

CO4 : One of the most important uses of statistics is to be able to make conclusions and test Hypothesis. Your conclusions can never be absolutely sure but you can quantify of your measure of confidence in the results.

TB1 : PROBABILITY AND STATISTICS By Dr. T.V.K. Iyengar, S. Chand & Company Pvt. Ltd., 2014.

38.	Statistical Decisions Statistical Hypotheses. Null Hypotheses Tests of Hypotheses and Significance Type I and Type II Errors Level of Significance	16-02-2022	Lecture interspersed with discussions
39.	Large Samples: Test for Single Mean, Problems	18-02-2022	
40.	Test for Two Means, Problems	18-02-2022	
41.	Test for Single Proportion, Problems	19-02-2022	
42.	Test for Two Proportion, Problems	28-02-2022	
43.	Tutorial Class	02-03-2022	
44.	Small Samples: Student t - distribution for	04-03-2022	

45.	Student t - distribution for two Means,	04-03-2022	
46.	Paired t - test, Problems	05-03-2022	
47.	F- distribution, Problems	07-03-2022	
48.	Chi- Square distribution for Goodness of fit,	08-03-2022	
49.	Chi- Square distribution for Contingency Tables	09-03-2022	
50.	Power of a Test Quality Control Charts Fitting	11-03-2022	

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UNIT – IV : ALGEBRAIC STRUCTURES AND NUMBER THEORY

CO5 : Overview of algebraic structures, Group theory, number theory, basic algorithms in number Theory.

TB1 : DISCRETE MATHEMATICS AND ITS APPLICATIONS WITH COMBINATORICS AND GRAPH THEORY, 7th Edition, H.Rosen, Tata McGraw Hill, 2003

51.	Algebraic systems, Examples, General properties	11-03-2022	Lecture interspersed with discussions
52.	Semi groups and Monoids	14-03-2022	
53.	Homomorphism of semi groups and monoids	15-03-2022	
54.	Group, Subgroup, Abelian Group, Homomorphism, Isomorphism	16-03-2022 18-03-2022	
55.	Tutorial class	18-03-2022	
56.	Properties of integers, division theorem	19-03-2022	
57.	GCD, Euclidean algorithm	21-03-2022 22-03-2022	
58.	LCM, Testing for prime numbers	23-03-2022	
59.	The fundamental theorem of Arithmetic	25-03-2022	
60.	Modular Arithmetic, Euler and Fermat's theorems	25-03-2022 26-03-2022	
61.	Tutorial class	28-03-2022	

UNIT –V : GRAPH THEORY

CO6: Student will be able to manipulate and analyze data graphically using Appropriate software.

TB1 : DISCRETE MATHEMATICS AND ITS APPLICATIONS WITH COMBINATORICS AND GRAPH THEORY, 7th Edition, H.Rosen, Tata McGraw Hill, 2003

62	Basic concepts of graphs, sub graphs	29-03-2022 30-03-2022	Lecture interspersed with discussions
63	Representation of graphs: Adjacency, Incidence matrices	01-04-2022	
64	Isomorphic graphs	01-04-2022	
65	Paths, circuits, Eulerian and Hamiltonian graphs	04-04-2022 05-04-2022 06-04-2022	
66	Multi graphs, Problems	08-04-2022	
67	Tutorial class	08-04-2022	
68	Planar graphs, Euler's formula	11-04-2022	
69	Graph Colouring and covering	12-04-2022	
70	Chromatic numbers	13-04-2022	
71	Spanning trees, Algorithms for spanning trees	16-04-2022	

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TENTATIVE LESSON PLAN: R2013

Course Title: : Computer Organization & Operating Systems		
Section:MCA	Date:04/01/2022	Page No: 01 of 04
Revision No: 00	Prepared By:M.ANITHA	Approved By: HOD

Tools: Black Board, PPTs

No. of Periods	Topic	Date	Mode of Delivery
UNIT-I: Machine Instructions and Programs.			
CO1: Understand the basic organization of computer and different instruction formats and addressing modes.			
TB:” Computer Organization, Carl Hamacher, Zvonks Vranesic, Safea Zak. “			
1	Computer Types	3/1/2022	Lecture interspersed with discussions & BB
2	Functional units	4/1/2022, 5/1/2022	
3	Basic Operational concepts	6/1/2022	
4	Bus structures	8/1/2022, 10/1/22	
5	Software, Performance,	11/1/2022, 12/2/2022	
6	multiprocessor and multi computers	17/1/2022	
7	Historical perspective	18/1/2022	
8	Numbers	20//1/2022	
9	Arithmetic Operations	22/1/2022	
10	Memory locations and address	24/1/2022	
11	Instructions and Instruction sequencing,	25/1/2022	
12	Memory operations	27/1/2022	
13	Addressing Modes,	28/1/2022	
14	Addressing Modes	29/1/2022	
15	Assembly Languages,	31/1/2022	
16	Stacks and Queues	1/2/2022	
17	Basic Input/output Operations, role of Stacks and Queues Additional Instructions	2/2/2022	
18	Tutorial Class	3/2//2022	
UNIT-II: Processing Unit, Micro Programmed Control			
CO2: Identify functional units and illustrate register transfer operations. Understand the basics of hardwired and micro-programmed control of the CPU,			

pipelined architectures.

TB:” Computer Organization, Carl Hamacher, Zvonks Vranesic, Saeaf Zak. “

1	Register Transfer	4/2/2022	Lecture interspersed with discussions & BB
2	Performing an Arithmetic or Logic Operation,	5/2/2022	
3	Fetching a Word from Memory	9/2/2022	
4	Execution of Complete Instruction	10/2/2022	
5	Transfers Hardwired Control	11/2/2022	
6	Micro Programmed Control: Microinstructions	12/2/2022	
7	Micro program Sequencing, Wide Branch Addressing	14/2/2022	
8	Microinstructions with next – Address Field	15/2/2022	
9	Tutorial Class	16/2/2022	

UNIT-III: Introduction to Operating System Concept Process Management.

CO3: To make aware of different types of Operating System and Analyze Process scheduling algorithms.

TB. “Operating System concepts, 7th ed, Abraham Silberschatz, Galvin, John Wiley & Sons, Inc”

1	Types of Operating Systems	17/2/2022	Lecture interspersed with discussions & BB
2	Operating Systems Concepts	18/2/2022	
3	Operating System Operations..	18/2/2022	
4	Operating Systems Structures- Operating System Services	19/2/2022	
5	User Operating-System Interface	19/2/2022	
6	Introduction to System calls, Types of System Calls	19/2/2022	
7	Process concept	28/2/2022	
8	Process State Diagram	3/3/2022	
9	Process control block, Process Scheduling	5/3/2022	
10	Inter process Communication	5/3/2022	
11	Threads- Threading Issues, Scheduling- Basic Concepts	7/3/2022	
12	Scheduling Criteria, Scheduling Algorithms	8/3/2022	
13	Tutorial Class	9/3/2022	

UNIT-IV: Process Synchronization, Principles of deadlock**CO4: Design and solve synchronization problems and dead lock management technique****TB:” Operating System concepts, 7th ed, Abraham Siliberschatz, Galvin, John Wiley & Sons, Inc. “**

1	The Critical-Section Problem	10/3/2022	Lecture interspersed with discussions & BB
2	Peterson’s Solution	11/3/2022	
3	Synchronization Hardware Starvation, Critical Regions form Deadlock	12/3/2022	
4	Semaphores, Classic Problems of Synchronization	14/3/2022	
5	Monitors	15/3/2022	
6	System Model, Deadlock	16/3/2022	
7	Characterization	17/3/2022	
8	Deadlock handling	21/3/2022	
9	Deadlock Prevention	22/3/2022	
10	Detection and Avoidance, Recovery	23/3/2022, 24/3/2022	
11	Tutorial Class	26/3/2022	

UNIT-V: Memory Management,File System Interface**CO5: Understand and analyze various issues related to memory hierarchy and Analyze memory management algorithms.****TB “Operating System concepts, 7th ed, Abraham Siliberschatz, Galvin, John Wiley & Sons, Inc.”**

1	Swapping	26/3/2022	Lecture interspersed with discussions & BB
2	Contiguous Memory Allocation	28/3/2022	
3	Paging	28/3/2022	
4	Structure of the Page Table	29/3/2022	
5	Segmentation Virtual Memory Management	30/3/2022	
6	Demand Paging	31/3/2022	
7	Page-Replacement Algorithms	1/4/2022	
8	Thrashing. File-System Interface	4/4/2022	
9	File Concept	5/4/2022	
10	Access Methods, Directory structure, File-System mounting	6/4/2022	
11	Files Sharing, Protection	7/4/2022	

12	File-System implementation- File-System Structure	8/4/2022	
13	Allocation Methods	9/4/2022	
14	Free-Space Management	11/4/2022	
15	Disk Structure, Disk Scheduling	12/4/2022	
16	Disk Scheduling	13/4/2022	
17	Tutorial Class	16/4/2022	

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TENTATIVE LESSION PLAN:MCA1104


Course Title: Data Structures		
Sem/Year: I/I	Date : 1/1/2022	Page No : 01 of 03
Revision No : 00	Prepared By: T. Bindu Madhavi	Approved By: HOD

Tools: BB, PPTs

No. of periods	TOPIC	Date	Mode of Delivery
Unit-1: Introduction to C CO1: Understand the basic concepts of C TB: "Let us C: Authentic Guide to C Programming Language, 17th ed.,Yashavant Kanetkar, BPBPublications.			
1	Introduction to C concepts	3/1/2022	PPT,BB
2	Constants and variables	4/1/2022	
3	Example programs on constants and data types	4/1/2022,5/1/2022	
4	Operators and expressions	6/1/2022,7/1/2022	
5	Operator and expressions programs	8/1/2022,10/1/2022	
6	Input and output operators	11/1/2022,12/2/2022	
7	Input and output operators	17/1/2022	
8	Conditional statements in C	18/1/2022,19/1/2022	
9	Conditional statements in C and example programs	20//1/2022,21/1/2022	
10	Looping variables	22/1/2022,24/1/2022	
11	Looping variables	25/1/2022,27/1/2022	
12	Example programs on looping	28/1/2022,29/1/2022	
13	Arrays Introduction	31/1/2022	
14	Arrays	1/2/2022	
15	Example programs on arrays	2/2/2022	
16	Tutorial	3/2/2022	
UNIT-II: Functions, Structures, Pointers, file handling in C. CO2: Understand the concepts of Functions, Structures, Pointers, file handling in C. TB:"Let us C: Authentic Guide to C Programming Language, 17th ed.,Yashavant Kanetkar, BPBPublications.			

No. of periods	TOPIC	Date	Mode of Delivery
17	Functions Introduction	4/2/2022	PPT,BB
18	Function types	5/2/2022	
19	Function types	7/2/2022	
20	Call by value and reference	8/2/2022	
21	Call by value and reference	9/2/2022	
22	Example programs on functions	10/2/2022	
23	Structures	11/2/2022	
24	Structure examples	12/2/2022	
25	Pointers	14/2/2022	
26	Pointers in C examples	15/2/2022	
27	Files introduction	16/2/2022	
28	File reading and writing ways	17/2/2022	
29	Example programs on functions	17/2/2022	
30	Tutorial	17/2/2022	
UNIT-III: Data Structures CO3: Understanding the usage of datastructures TB: "Let us C: Authentic Guide to C Programming Language, 17th ed., Yashavant Kanetkar, BPB Publications.			
31	Definition and types of data structures	18/2/2022	PPT,BB
32	Recursion	18/2/2022	
33	Recursion types and programs	19/2/2022	
34	Algorithm analysis and complexity	19/2/2022	
35	Algorithm analysis and complexity	19/2/2022	
36	Linked list introduction	28/2/2022, 2/3/2022	
37	Linked list and its types	3/3/2022, 4/3/2022	
38	List Implementations	5/3/2022	
39	Example Programs	7/3/2022, 8/3/2022	
40	Tutorial	9/3/2022	
UNIT-IV: Stacks CO4: Understand the concept of stacks and queues. TB: "Let us C: Authentic Guide to C Programming Language, 17th ed., Yashavant Kanetkar, BPB Publications.			
41	Stacks	10/3/2022	PPT,BB
42	Stacks creation with examples	11/3/2022, 12/3/2022	
43	Queue introduction	14/3/2022,	

No. of periods	TOPIC	Date	Mode of Delivery	
		15/3/2022		
44	Queue implementations	16/3/2022		
45	Operations on queues	17/3/2022, 19/3/2022		
46	Example programs	21/3/2022		
47	Example programs on queues and stacks	22/3/2022		
48	Hashing	23/3/2022		
49	Hashing types	24/3/2022		
50	Hashing types	25/3/2022		
51	Double hashing	26/3/2022		
52	Extendable hashing	28/3/2022		
53	Programs on Hashing	28/3/2022		
54	Tutorial	29/3/2022		
UNIT-V: Sorting Techniques and Trees. CO5: Understand the concepts of sorting techniques and Trees. TB: "Let us C: Authentic Guide to C Programming Language, 17th ed., Yashavant Kanetkar, BPB Publications.				
55	Insertion and selection sort	30/3/2022		PPT, BB
56	Bubble sort program	31/3/2022		
57	Quick sort example and Program	1/4/2022		
58	Merge sort example and Program	4/4/2022		
59	Trees Introduction	5/4/2022		
60	Binary trees	6/4/2022		
61	Tree traversal	7/4/2022		
62	Tree traversal	8/4/2022		
63	Binary tree implementation in C	9/4/2022		
64	Binary Search Tree (BST)	11/4/2022		
65	BST operations	12/4/2022		
66	BST operations	13/4/2022		
67	BST implementation program in C	16/4/2022		
68	Tutorial	16/4/2022		


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TENTATIVE LESSONPLAN

MACHINE LEARNING WITH PYTHON: MCA3101

Course Title: MACHINE LEARNING WITH PYTHON		
Section: MCA	Date :08/10/2022	Page No : 01 of 03
Revision No : 00	Prepared by: K.Pavani	Approved by : HOD

Tools: Black board, PPTs

UNIT I:Introduction to Machine Learning with Python

CO1:Illustrate and comprehend the basics of Machine Learning with •

TB:Introduction to Machine Learning with Python: A Guide for Data Scientists, Andreas C. Muller & Sarah Guido, Orielly Publications, 2019

No. of periods	TOPIC	Date	Mode of Delivery
1.	Introduction to Machine Learning, basic terminology,	10/10/2022	Lecture interspersed with discussions&& BB
2.	Types of Machine Learning,	11/10/2022	
3.	Machine learning applications	12/10/2022	
4.	Using Python for Machine Learning: Installing Python and packages from the Python Package Index,	13/10/2022	
5.	Introduction to NumPy, SciPy,	14/10/2022,15/10/2022	
6.	Introduction to matplotlib and scikit-learn	17/10/2022	
7.	Tiny application of Machine Learning	18/10/2022	
8.	Tutorial classes	19/10/2022	
9.	Tutorial classes	20/10/2022	
10.	Tutorial classes	21/10/2022,22/10/2022	

UNIT II:Supervised Learning

CO 2: Demonstrate the Python algorithms of Supervised Learning and be able to differentiate linear and logistic regressions

TB: Introduction to Machine Learning with Python: A Guide for Data Scientists, Andreas C. Muller & Sarah Guido, Orielly Publications, 2019.

11.	Types of Supervised Learning,	25/10/2022	Lecture interspersed with discussions&& BB
12.	Supervised Machine Learning Algorithms: kNearest Neighbors	26/10/2022	
13.	Regression Models	27/10/2022	
14.	Naive Bayes Classifiers,	28/10/2022	
15.	Decision Trees,	29/10/2022	
16.	Ensembles of Decision Trees,	29/10/2022,31.10/2022	



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17.	Kernelized Support Vector Machines,	01/11/2022,02/11/2022	
18.	Uncertainty Estimates from Classifiers.	03/11/2022	
19.	Tutorial classes	04/11/2022,05/11/2022	
20.	Tutorial classes	07/11/2022,08/11/2022	
21.	Tutorial classes	09/11/2022,10/11/2022	
22.	Tutorial classes	11/11/2022	

UNIT III: Building good training datasets, Compressing data via dimensionality reduction
CO 3: Demonstrate the algorithms of Unsupervised Learning and be able to understand the clustering algorithms

TB: Building Machine Learning Systems with Python, Luis Pedro Coelho, Willi Richert, 2nd Edition, 2015.

23.	Dealing with missing data	14/11/2022	Lecture interspersed with discussions & BB
24.	Handling categorical data	15/11/2022,16/11/2022,17/11/2022	
25.	partitioning a data set into separate training and test datasets	18/11/2022,19/11/2022	
26.	bringing features onto the same scale	21/11/2022,22/11/2022	
27.	selecting meaningful features	23/11/2022,24/11/2022	
28.	assessing feature importance with random forests	05/12/2022,06/12/2022	
29.	Unsupervised dimensionality reduction via PCA	07/12/2022,08/12/2022	
30.	Supervised data compression via linear discriminant analysis	09/12/2022	
31.	Tutorial classes	13/12/2022,14/12/2022	
32.	Tutorial classes	15/12/2022,16/12/2022	
33.	Tutorial classes	17/12/2022	

UNIT IV: Learning best Practices for Model Evaluation and Hyperparameter tuning, Combining different models for Ensemble learning:

CO 4: Evaluate the concepts of binning, pipeline Interfaces with examples

TB: Building Machine Learning Systems with Python, Luis Pedro Coelho, Willi Richert, 2nd Edition, 2015

34.	streamlining workflows with pipelines	19/12/2022,20/12/2022	Lecture interspersed with discussions & BB
35.	using k-fold cross validation to assess model performance	21/12/2022,22/12/2022	
36.	debugging algorithms with learning and validation curves	23/12/2022	
37.	debugging algorithms with learning and	24/12/2022,26/12/2022	



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	validation curves		
38.	fine tuning machine learning models via grid search	27/12/2022,28/12/2022	
39.	looking at different performance evaluation metrics.	29/12/2022,30/12/2022	
40.	learning with ensembles,	31/12/2022	
41.	combining classifiers via majority vote,	02/01/2023	
42.	bagging-building an ensemble of classifiers from bootstrap samples,	03/01/2023	
43.	leveraging weak learners via adaptive boosting	04/01/2023	
44.	leveraging weak learners via adaptive boosting	05/01/2023	
45.	Tutorial Classes	06/01/2023	
46.	Tutorial Classes		
UNIT V: Working with Text Data (Data Visualization)			
CO 5 Apply the sentiment analysis for various case studies			
TB: Introduction to Machine Learning with Python: A Guide for Data Scientists, Andreas C. Muller & Sarah Guido, Orieilly Publications, 2019.			
47.	Types of Data Represented as Strings	07/01/2023	Lecture interspersed with discussions & BB
48.	Example Application: Sentiment Analysis of Movie Reviews	09/01/2023	
49.	Sentiment Analysis of Movie Reviews	10/01/2023	
50.	Representing Text Data as a Bag of Words	11/01/2023	
51.	Stop Words, Rescaling the Data with tf-idf	12/01/2023	
52.	Investigating Model Coefficients,	17/01/2023	
53.	Approaching a Machine Learning Problem,	18/01/2023	
54.	Testing Production Systems,	19/01/2023	
55.	Ranking	20/01/2023	
56.	Recommender Systems and Other kinds of Learning.	21/01/2023	
57.	Tutorial classes	07/01/2023	

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TENTATIVE LESSONPLAN

TENTATIVE LESSONPLAN: MC2033

Course Title: Web Technologies		
Section : II MCA	Date : 10/10/2022	Page No : 01 of 03
Revision No : 00	Prepared by: E. NAGARAJU	Approved by : HOD

Tools: Black board, PPTs

UNIT I: Web Basics- Introduction, Concept of Internet
CO 1: Analyze a web page and identify its elements and attributes.
TB: Web Technologies, Uttam K Roy, Oxford University Press.

No. of periods	TOPIC	Date	Mode of Delivery
1.	Web Basics- Introduction	10/10/2022	Lecture interspersed with discussions BB & PPT
2.	Concept of Internet- History of Internet, Protocols of Internet, World Wide Web	11/10/2022	
3.	URL, Web Server, Web Browser	12/10/2022	
4.	HTML- Introduction, History of HTML, Structure of HTML Document	13/10/2022	
5.	Text Basics, Structure of HTML Document	14/10/2022	
6.	Images and Multimedia	15/10/2022	
7.	Links and webs, Document Layout	17/10/2022	
8.	Creating Forms, Frames	18/10/2022	
9.	Creating Tables	19/10/2022	
10.	Cascading style sheets	20/10/2022 to 21/10/2022	
11.	TUTORIAL CLASS	22/10/2022	

UNIT II: Introduction of XML, XML Schemes, Document Object Model
CO 2: To acquire knowledge of xml fundamentals and usage of xml technology in electronic data interchange
TB: Web Technologies, Uttam K Roy, Oxford University Press.

No. of periods	TOPIC	Date	Mode of Delivery
12.	XML Introduction- Introduction of XML,	25/10/2022	Lecture interspersed with discussions BB & PPT
13.	Defining XML tags	26/10/2022	
14.	XML tags attributes and values	26/10/2022 to 28/10/2022	
15.	Document Type Definition	29/10/2022	
16.	XHTML Parsing	31/10/2022 to 01/11/2022	
17.	XML Data – DOM	02/11/2022 to 05/11/2022	
18.	XML Schemes	07/11/2022 to	



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		09/11/2022	
19.	XML Data types	10/11/2022 to 11/11/2022	
20.	SAX Parsers in java	12/11/2022 to 15/11/2022	
21.	TUTORIAL CLASS	16/11/2022	

UNIT III: Introduction to Servlets, connecting to a database using JDBC
CO 3: To design and develop web based enterprise systems for the enterprises using technologies like Servlet
TB: Web Technologies, Uttam K Roy, Oxford University Press.

No. of periods	TOPIC	Date	Mode of Delivery
22.	Introduction to Servlets	17/11/2022	Lecture interspersed with discussions BB & PPT
23.	Common Gateway Interface (CGI)	18/11/2022 to 19/11/2022	
24.	Life cycle of a Servlet	01/11/2022	
25.	Deploying a Servlet	21/11/2022	
26.	The Servlet API	22/11/2022	
27.	Reading Servlet parameters	23/11/2022	
28.	Reading Initialization parameters	24/11/2022	
29.	Handling Http Request & Responses	25/11/2022 to 26/11/2022	
30.	Using Cookies and Sessions	05/12/2022	
31.	connecting to a database using JDBC	06/12/2022 to 08/12/2022	
32.	TUTORIAL CLASS	09/12/2022	

UNIT IV: Introduction to JSP, connecting to a database using JDBC
CO 4: To design and develop web based enterprise systems for the enterprises using technologies like Jsp
TB: Web Technologies, Uttam K Roy, Oxford University Press.

No. of periods	TOPIC	Date	Mode of Delivery
33.	Introduction to JSP: The Anatomy of a JSP Page	10/12/2022	Lecture interspersed with discussions BB
34.	JSP Processing, Declarations, Directives	12/12/2022	
35.	Expressions, Code Snippets, implicit objects	13/12/2022 to 14/12/2022	
36.	Using Beans in JSP Pages	15/12/2022	
37.	Using Cookies and session for session tracking	16/12/2022 to 17/12/2022	
38.	Connecting to database in JSP	19/12/2022	
39.	Client-side Scripting: Introduction to JavaScript	20/12/2022 to	



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		21/12/2022	& PPT
40.	JavaScript language – declaring variables, scope of variables	22/12/2022	
41.	Functions. Event handlers (on Click, on Submit etc.),	23/12/2022	
42.	Document Object Model, Form validation	24/12/2022 to 26/12/2022	
43.	Tutorial class	27/12/2022	

UNIT V: Introduction to PHP: Declaring variables, PHP: File operations

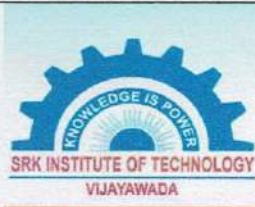
CO 5: Build web applications using PHP

TB: Web Technologies, Uttam K Roy, Oxford University Press.

No. of periods	TOPIC	Date	Mode of Delivery
44.	Introduction to PHP: Declaring variables, data types	28/12/2022 to 29/12/2022	Lecture interspersed with discussions BB & PPT
45.	Arrays, Strings, Operators	30/12/2022 to 31/12/2022	
46.	Expressions, Control structures	02/01/2023 to 04/2023	
47.	Functions reading data from web form controls like text boxes, radio buttons, list,	05/01/2023 to 07/01/2023	
48.	Handling File Uploads, Connecting to database (MySQL as reference), Executing simple queries	09/01/2023 to 11/01/2023	
49.	Handling results, Handling sessions and cookies File	16/01/2023 to 18/01/2023	
50.	Handling in PHP: File operations like opening, closing,	19/01/2023 to 20/01/2023	
51.	Reading, writing, appending, deleting etc	21/01/2023	
52.	On text and binary files, listing directories	23/01/2023	
53.	Handling results, Handling sessions and cookies File	24/01/2023 to 25/01/2023	
54.	Tutorial class	27/01/2023	

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TENTATIVE LESSONPLAN

TENTATIVE LESSONPLAN: MC2033

Course Title: Web Technologies		
Section : II MCA	Date : 10/10/2022	Page No : 01 of 03
Revision No : 00	Prepared by: E. NAGARAJU	Approved by : HOD

Tools: Black board, PPTs

UNIT I: Web Basics- Introduction, Concept of Internet
CO 1: Analyze a web page and identify its elements and attributes.
TB: Web Technologies, Uttam K Roy, Oxford University Press.

No. of periods	TOPIC	Date	Mode of Delivery
1.	Web Basics- Introduction	10/10/2022	Lecture interspersed with discussions BB & PPT
2.	Concept of Internet- History of Internet, Protocols of Internet, World Wide Web	11/10/2022	
3.	URL, Web Server, Web Browser	12/10/2022	
4.	HTML- Introduction, History of HTML, Structure of HTML Document	13/10/2022	
5.	Text Basics, Structure of HTML Document	14/10/2022	
6.	Images and Multimedia	15/10/2022	
7.	Links and webs, Document Layout	17/10/2022	
8.	Creating Forms, Frames	18/10/2022	
9.	Creating Tables	19/10/2022	
10.	Cascading style sheets	20/10/2022 to 21/10/2022	
11.	TUTORIAL CLASS	22/10/2022	

UNIT II: Introduction of XML, XML Schemes, Document Object Model
CO 2: To acquire knowledge of xml fundamentals and usage of xml technology in electronic data interchange
TB: Web Technologies, Uttam K Roy, Oxford University Press.

No. of periods	TOPIC	Date	Mode of Delivery
12.	XML Introduction- Introduction of XML,	25/10/2022	Lecture interspersed with discussions BB & PPT
13.	Defining XML tags	26/10/2022	
14.	XML tags attributes and values	26/10/2022 to 28/10/2022	
15.	Document Type Definition	29/10/2022	
16.	XHTML Parsing	31/10/2022 to 01/11/2022	
17.	XML Data – DOM	02/11/2022 to 05/11/2022	
18.	XML Schemes	07/11/2022 to	



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		09/11/2022	
19.	XML Data types	10/11/2022 to 11/11/2022	
20.	SAX Parsers in java	12/11/2022 to 15/11/2022	
21.	TUTORIAL CLASS	16/11/2022	

UNIT III: Introduction to Servlets, connecting to a database using JDBC
CO 3: To design and develop web based enterprise systems for the enterprises using technologies like Servlet
TB: Web Technologies, Uttam K Roy, Oxford University Press.

No. of periods	TOPIC	Date	Mode of Delivery
22.	Introduction to Servlets	17/11/2022	Lecture interspersed with discussions BB & PPT
23.	Common Gateway Interface (CGI)	18/11/2022 to 19/11/2022	
24.	Life cycle of a Servlet	01/11/2022	
25.	Deploying a Servlet	21/11/2022	
26.	The Servlet API	22/11/2022	
27.	Reading Servlet parameters	23/11/2022	
28.	Reading Initialization parameters	24/11/2022	
29.	Handling Http Request & Responses	25/11/2022 to 26/11/2022	
30.	Using Cookies and Sessions	05/12/2022	
31.	connecting to a database using JDBC	06/12/2022 to 08/12/2022	
32.	TUTORIAL CLASS	09/12/2022	

UNIT IV: Introduction to JSP, connecting to a database using JDBC
CO 4: To design and develop web based enterprise systems for the enterprises using technologies like Jsp
TB: Web Technologies, Uttam K Roy, Oxford University Press.

No. of periods	TOPIC	Date	Mode of Delivery
33.	Introduction to JSP: The Anatomy of a JSP Page	10/12/2022	Lecture interspersed with discussions BB
34.	JSP Processing, Declarations, Directives	12/12/2022	
35.	Expressions, Code Snippets, implicit objects	13/12/2022 to 14/12/2022	
36.	Using Beans in JSP Pages	15/12/2022	
37.	Using Cookies and session for session tracking	16/12/2022 to 17/12/2022	
38.	Connecting to database in JSP	19/12/2022	
39.	Client-side Scripting: Introduction to JavaScript	20/12/2022 to	



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		21/12/2022	& PPT
40.	JavaScript language – declaring variables, scope of variables	22/12/2022	
41.	Functions. Event handlers (on Click, on Submit etc.),	23/12/2022	
42.	Document Object Model, Form validation	24/12/2022 to 26/12/2022	
43.	Tutorial class	27/12/2022	

UNIT V: Introduction to PHP: Declaring variables, PHP: File operations

CO 5: Build web applications using PHP

TB: Web Technologies, Uttam K Roy, Oxford University Press.

No. of periods	TOPIC	Date	Mode of Delivery
44.	Introduction to PHP: Declaring variables, data types	28/12/2022 to 29/12/2022	Lecture interspersed with discussions BB & PPT
45.	Arrays, Strings, Operators	30/12/2022 to 31/12/2022	
46.	Expressions, Control structures	02/01/2023 to 04/2023	
47.	Functions reading data from web form controls like text boxes, radio buttons, list,	05/01/2023 to 07/01/2023	
48.	Handling File Uploads, Connecting to database (MySQL as reference), Executing simple queries	09/01/2023 to 11/01/2023	
49.	Handling results, Handling sessions and cookies File	16/01/2023 to 18/01/2023	
50.	Handling in PHP: File operations like opening, closing,	19/01/2023 to 20/01/2023	
51.	Reading, writing, appending, deleting etc	21/01/2023	
52.	On text and binary files, listing directories	23/01/2023	
53.	Handling results, Handling sessions and cookies File	24/01/2023 to 25/01/2023	
54.	Tutorial class	27/01/2023	

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TENTATIVE LESSONPLAN

TENTATIVE LESSONPLAN: MC2033

Course Title: Cryptography and Network Security		
Section :II MCA	Date : 08/10/2022	Page No : 01 of 03
Revision No : 00	Prepared by:G. Keerthi	Approved by: HOD

Tools: Black board, PPTs

UNIT I:Basic Principles, Symmetric Encryption

CO1:Explain Basic Principles, different security threats, countermeasures, foundation course of cryptography mathematics and Symmetric Encryption

TB: Cryptography and Network Security, 3rd Edition Behrouz A Forouzan, Deb deep Mukhopadhyay, McGraw Hill,2015

No. of periods	TOPIC	Date	Mode of Delivery
1.	Security Goals	10/10/2022	Lecture interspersed with discussions, BB
2.	Cryptographic Attacks	11/10/2022	
3.	Services and Mechanisms	12/10/2022	
4.	Mathematics of Cryptography, Integer Arithmetic, Modular Arithmetic	14/10/2022,15/10/2022	
5.	Matrices, Linear Congruence	17/10/2022,18/10/2022	
6.	Mathematics of Symmetric Key Cryptography, Algebraic Structures	18/10/2022,19/10/2022	
7.	Introduction to Modern Symmetric Key Ciphers	21/10/2022,22/10/2022	
8.	Modern Block Ciphers, Modern Stream Ciphers	24/10/2022,26/10/2022	
9.	Data Encryption Standard, DES Structure, DES Analysis	28/10/2022,29/10/2022	
10.	Advanced Encryption Standard, Rounds	31/10/2022,1/11/2022	
11.	Key Expansion, Analysis Of AES	2/11/2022,4/11/2022	
12.	Tutorial	5/11/2022	

UNIT II: Asymmetric Encryption

CO2: Classify the basic principles of Asymmetric key algorithms and operations of asymmetric key cryptography

TB: Cryptography and Network Security, 3rd Edition Behrouz A Forouzan, Deb deep Mukhopadhyay, McGraw Hill,2015

No. of periods	TOPIC	Date	Mode of Delivery
13.	Primes	7/11/2022	Lecture interspersed with discussions, BB
14.	Primality Testing	8/11/2022	
15.	Factorization	9/11/2022	



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16.	Asymmetric Key Cryptography	11/11/2022	Lecture interspersed with discussions, BB
17.	RSA Cryptosystem	14/11/2022	
18.	Rabin Cryptosystem	15/11/2022	
19.	ElGamal Cryptosystem	16/11/2022	
20.	Elliptic Curve Cryptosystem	18/11/2022	
21.	Tutorial	19/11/2022	

UNIT III: Cryptographic Hash Functions

CO3: Design Cryptographic Hash Functions as SHA-3 and Digital Signatures as Elgamal

TB: Cryptography and Network Security, 3rd Edition Behrouz A Forouzan, Deb deep Mukhopadhyay, McGraw Hill, 2015

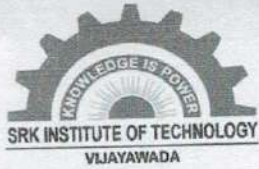
No. of periods	TOPIC	Date	Mode of Delivery
22.	Applications of Cryptographic Hash Functions	21/11/2022	Lecture interspersed with discussions BB
23.	Two Simple Hash Functions Requirements	22/11/2022	
24.	Security Hash Functions Based on Cipher Block Chaining	23/11/2022	
25.	Secure Hash Algorithm (SHA)	25/11/2022	
26.	SHA-3	26/1/2022	
27.	Digital Signatures: Elgamal Digital Signature Scheme	5/12/2022, 6/12/2022	
28.	Schnorr Digital Signature	7/12/2022	
29.	NIST Digital Signature Algorithm	9/12/2022	
30.	Tutorial	12/12/2022	

UNIT IV: Key Management and Distribution

CO 4: Explain the concept of Key Management and Distribution and User Authentication

TB: Cryptography and Network Security, 3rd Edition Behrouz A Forouzan, Deb deep Mukhopadhyay, McGraw Hill, 2015

No. of periods	TOPIC	Date	Mode of Delivery
31.	Symmetric Key Distribution Using Symmetric Encryption	13/12/2022	
32.	Symmetric Key Distribution Using Asymmetric Encryption	14/12/2022	
33.	Distribution of Public Keys, X.509 Certificates	16/12/2022, 17/12/2022	



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34.	User Authentication: User Authentication	19/12/2022	Lecture interspersed with discussions BB
35.	Remote User-Authentication Principle	20/12/2022,21/12/2022	
36.	Remote User-Authentication Using Symmetric Encryption	22/12/2022,23/12/2022	
37.	Kerberos	26/12/2022	
38.	Remote User-Authentication Using Asymmetric Encryption	27/12/2022,28/12/2022	
39.	Tutorial	29/12/2022	

UNIT V: Network and Internet Security Electronic Mail Security:

CO 5: Determine the knowledge of Network and Internet Security Protocols such as S/MIME

TB1: Cryptography and Network Security, 3rd Edition Behrouz A Forouzan, Deb deep Mukhopadhyay, McGraw Hill, 2015

TB2: Cryptography and Network Security, William Stallings, Global Edition, 7e Pearson, 2017

No. of periods	TOPIC	Date	Mode of Delivery
40.	Internet Mail Architecture	2/1/2023, 3/1/2023	Lecture interspersed with discussions BB
41.	Email Formats	4/1/2023, 6/1/2023	
42.	Email Threats and Comprehensive Email Security	7/1/2023,9/1/2023	
43.	S/MIME	10/1/2023	
44.	IP Security: IP Security Policy	16/1/2023	
45.	Encapsulating Security Payload	17/1/2023	
46.	Combining Security Associations Internet Key Exchange	18/1/2023,19/1/2023	
47.	Tutorial	20/1/2022	

G. Keerthi
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M. Antte
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SRK INSTITUTE OF TECHNOLOGY
Enikepadu, Vijayawada 521108
Department of Master of Computer Applications
TENTATIVE LESSONPLAN

SOFTWARE PROJECT MANAGEMENT: MCA3105

Course Title: SOFTWARE PROJECT MANAGEMENT		
Section :II MCA	Date :08/10/2022	Page No : 01 of 03
Revision No : 00	Prepared by:Ch.Satyanarayana reddy	Approved by : HOD

Tools: Black board, PPTs

Unit-1 :Conventional Software Management: The waterfall model, Evolution of Software Economics, Improving Software Economics,The old way and the new.

CO1: Apply the process to be followed in the software development life-cycle models

TB: Software Project Management, Walker Royce, PEA, 2005.

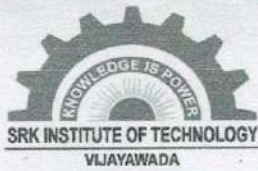
No. of periods	TOPIC	Date	Mode of Delivery
1	The waterfall model,.	10/10/2022	BB,PPT
2	conventional software Management performance	11/10/2022	
3	Software Economics, pragmatic software cost estimation	12/10/2022	
4	Reducing Software product size	13/10/2022	
5	improving software processes	14/10/2022,15/10/2022	
6	improving team effectiveness	17/10/2022	
7	improving automation	18/10/2022	
8	Achieving required quality	19/10/2022	
9	peer inspections	20/10/2022	
10	The principles of conventional software Engineering,	21/10/2022,22/10/2022	
11	principles of modern software management,	25/10/2022	
12	transitioning to an iterative process.	26/10/2022	
13	TUTORIAL CLASS	27/10/2022	
14	TUTORIAL CLASS	28/10/2022	

UNIT-II: Life cycle phases: Engineering and production stages, Artifacts of the process

CO2: • Apply the concepts of project management & planning

TB:Software Project Management, Walker Royce, PEA, 2005.

No. of periods	TOPIC	Date	Mode of Delivery
1.	Engineering and production stages	29/10/2022,31.10/2022	BB,PPT
2.	Elaboration, construction	01/11/2022,02/11/2022	
3.	inception, transition phases.	03/11/2022	
4.	The artifact sets	04/11/2022,05/11/2022	
5.	Management artifacts	07/11/2022,08/11/2022	
6.	Engineering artifacts	09/11/2022,10/11/2022	
7.	programmatic artifacts	11/11/2022	
8.	TUTORIAL CLASS	14/11/2022	



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No. of periods	TOPIC	Date	Mode of Delivery
UNIT-III: Model based software architectures, Work Flows of the process, Checkpoints of the process, Process ,Iterative process planning.			
CO3: • Implement the project plans through managing people, communications and change			
TB:Software Project Management, Walker Royce, PEA, 2005.			
1	A Management perspective and technical perspective.	15/11/2022,16/11/2022, 17/11/2022	BB,PPT
2	Software process workflows, Iteration workflows.	18/11/2022,19/11/2022	
3	Major mile stones, Minor Milestones,	21/11/2022,22/11/2022	
4	Periodic status assessments	23/11/2022,24/11/2022	
5	Work breakdown structures, Iteration planning process	05/12/2022,06/12/2022	
6	planning guidelines, cost and schedule estimating,	07/12/2022,08/12/2022	
7	Pragmatic planning	09/12/2022	
8	TUTORIAL CLASS	25/11/2022,12/12/2022	
UNIT-IV: Project Organizations and Responsibilities, Project Control and Process instrumentation: CO4: . • Conduct activities necessary to successfully complete and close the Software projects			
TB:Software Project Management, Walker Royce, PEA, 2005.			
No. of periods	TOPIC	Date	Mode of Delivery
1	Line-of-Business Organizations, Project Organizations,	13/12/2022,14/12/2022	BB,PPT
2	evolution of Organizations	15/12/2022,16/12/2022	
3	Automation Building blocks, The Project Environment	17/12/2022	
4	The seven core Metrics,	19/12/2022,20/12/2022	
5	Management indicators	21/12/2022,22/12/2022	
6	quality indicators,	23/12/2022	
7	life cycle expectations	24/12/2022,26/12/2022	
8	pragmatic Software Metrics,	27/12/2022,28/12/2022	
9	Metrics automation	29/12/2022,30/12/2022	



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10	TUTORIAL CLASS	31/12/2022	
UNIT-V: Agile Methodology, Fundamentals of DevOps CO5: Implement communication, modeling, and construction & deployment practices in software development. TB:Succeeding with Agile: Software Development Using Scrum, Mike Cohn, Addison Wesley.			
No. of periods	TOPIC	Date	Mode of Delivery
1	Agile Methodology,	02/01/2023	BB,PPT
2	adapting to Scrum, Patterns	03/01/2023	
3	for Adopting Scrum.,	04/01/2023	
4	, Iterating towards Agility	05/01/2023	
5	Fundamentals of DevOps: Architecture	06/01/2023	
6	Deployments,	07/01/2023	
7	Orchestration, Need, Instance of applications,	09/01/2023	
8	DevOps delivery pipeline, DevOps eco system.	10/01/2023	
9	DevOps adoption in projects: Technology aspects	11/01/2023	
10	Agiling capabilities	12/01/2023,17/01/2023	
11	Tool stack implementation	18/01/2023	
12	People aspect, processes	19/01/2023	
13	TUTORIAL CLASS	20/01/2023	
14	REVISION	21/01/2023	

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