KVA DAV College for Women, Karnal
Lesson plan for the odd semester

Name of the Teacher – Ms. Sakshi Aneja
Subject- Computer Science
BCA-352 (Operating System-I)
Class- BCA 5th Sem

October, 2021 2nd Week **11 Oct-16 Oct**	Operating System: Definition, Characteristics, Components, Functions. Examples; Types of Operating System: Single User, Multi User
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
3rd Week **18 Oct-23 Oct**	Classification of Operating System: Batch, Multiprogrammed, Timesharing, Multiprocessing, Parallel, Distributed, Real Time; System Calls and System Programs Process Control,
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
4th Week **25 Oct-30 Oct**	Revision and Tests of Unit I
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	Process Management: Process concept, Process states and Process Control Block; Process Scheduling
14 Nov, 2021	**Sunday**
3rdWeek **15 Nov-20 Nov**	Scheduling Queues, Schedulers, Context Switch; Operation on Processes: Process Creation, Process Termination; Cooperating Processes, Introduction to Threads, Inter-process Communication
19 Nov, 2021	**Guru Nanak Dev Jayanti**
21 Nov, 2021	**Sunday**
4thWeek **22 Nov-27**	CPU Scheduling: Basic Concepts, Scheduling Criteria, Scheduling Algorithms: FCFS, SJF, Priority, Round-Robin, Multilevel Queue, Multilevel Feedback Queue Scheduling
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov-04 Dec**	Deadlocks: System Model, Deadlock Characterization, Methods of Handling Deadlocks, Deadlock Prevention, Deadlock Avoidance, Deadlock Detection and Recovery
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Memory Management: Introduction, Swapping, Contiguous Allocation: Single-Partition/Multiple Partition Allocation, External/Internal Fragmentation
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	Segmentation: Basic Method, Hardware, Implementation of Segment Table, Advantages/Disadvantages of Paging/Segmentation

KVA DAV College for Women, Karnal
Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Sakshi Aneja
Subject- Computer Science
BCA-352 (Operating System-I)
Class- BCA 5th Sem

19 Dec,2021	**Sunday**
4th Week 20 Dec-24 Dec	Virtual Memory: Introduction, Demand Paging
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week 27 Dec -01 Jan	Page Replacement, Page Replacement Algorithms:FIFO, Optimal
2 Jan ,2022	**Sunday**
Jan ,2022 1st week 3 Jan – 8 Jan	LRU, Counting; Thrashing and its cause;
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week 10 Jan – 15 Jan	File Management: File Concepts, File Attributes, File Operations
16 Jan ,2022	**Sunday**
3rd week 17 Jan – 22 Jan	Revision of Previous Syllabus
23 Jan ,2022	**Sunday**
4th Week 24 Jan – 29 Jan, 31 Jan	Sessional Exams
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2021 1st week 1 Feb-4 Feb	File Types, File Access/Allocation Methods, File Protection, File Recovery
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week 7 Feb- 12 Feb	Revision of Syllabus and Class Tests
13 Feb ,2022	**Sunday**
3rd week 14 Feb- 19 Feb	Revision of Syllabus and Class Tests

KVA DAV College for Women, Karnal
Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Sakshi Aneja
Class-M.Sc. 1ˢᵗ Sem
Subject- MS-15-13 SOFTWARE ENGINEERING

3ʳᵈ Week 15 Nov-20 Nov	Introduction: Software Crisis-problem and causes, Software Processes, Software life cycle models: Waterfall, Prototype, Evolutionary and Spiral models, Overview of Quality Standards like ISO 9001, SEI-CMM, CMMI,PCMM, Six Sigma.
19 Nov, 2021	**Guru Nanak Dev Jayanti**
21 Nov, 2021	**Sunday**
4ᵗʰ Week 22 Nov-27	Software Metrics: Size Metrics like LOC, Token Count, Function Count, Design Metrics, Data Structure Metrics, Information Flow Metrics, cyclomatic complexity, Halstead Complexity measures.
28 Nov, 2021	**Sunday**
Dec, 2021 1ˢᵗ Week 29 Nov-04 Dec	Software Project Planning: Cost estimation, static, Single and multivariate models, COCOMO model, Putnam Resource Allocation Model, Risk management, project scheduling, personnel planning, team structure, Software configuration management, quality assurance, project monitoring.
05 Dec, 2021	**Sunday**
2ⁿᵈ Week 06 Dec -11 Dec	Software Requirement Analysis and Specifications: Structured Analysis, Data Flow Diagrams, Data Dictionaries, Entity-Relationship diagrams, Software Requirement and Specifications, Behavioral and non-behavioral requirements.
12 Dec,2021	**Sunday**
3ʳᵈ week 13 Dec -18 Dec	Software Design: Design fundamentals, problem partitioning and abstraction, design methodology, Cohesion & Coupling, Function Oriented Design and User Interface Design. Coding: Programming style, structured programming
19 Dec,2021	**Sunday**
4ᵗʰ Week 20 Dec-24 Dec	Software reliability: Metric and specification, Musa and JM reliability model, fault avoidance and tolerance, exception handling, defensive programming
25 Dec,2021 26 Dec,2021	**Christmas** **Sunday**
5ᵗʰ Week 27 Dec -01 Jan	Software Testing: Functional testing: Boundary Value Analysis, Equivalence class testing, Cause effect graphing
2 Jan ,2022	**Sunday**
Jan ,2022 1ˢᵗ week 3 Jan – 8 Jan	Structural testing: Control flow based and data flow based testing, loop testing, mutation testing, load, stress and performance testing.
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2ⁿᵈ week 10 Jan – 15 Jan	software testing strategies: unit testing, integration testing, System testing, Alpha and Beta testing, debugging. Static Testing: Formal Technical Reviews, Walk Through, Code Inspection
16 Jan ,2022	**Sunday**
3ʳᵈ week 17 Jan – 22 Jan	Revision of Previous Syllabus
23 Jan ,2022	**Sunday**
4ᵗʰ Week 24 Jan – 29 Jan, 31 Jan	**Sessional Exam**

KVA DAV College for Women, Karnal
Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Sakshi Aneja
Class-M.Sc. 1st Sem
Subject- MS-15-13 SOFTWARE ENGINEERING

26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 **1st week** **1 Feb-4 Feb**	Software Maintenance: Types of Maintenance, Maintenance Process, Maintenance characteristics. Reverse Engineering, Software Re-engineering
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Testing & its types
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 19 Feb**	Revision of Syllabus and Tests

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Harbinder Kaur
Subject- Computer Science
Paper- BCA-231 (Object Oriented Programming using C++)
Class- BCA 3rd Sem

October, 2021 **2nd Week** **11 Oct-16 Oct**	What is Object Oriented Programming & How it differs from C. Object oriented Programming: Object-Oriented programming features and benefits. Object-Oriented features of C++, Class and Objects, Data Hiding & Encapsulation.
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
3rd Week **18 Oct-23 Oct**	Structures, Data members and Member functions, Scope resolution operator and its significance.
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
4th Week **25 Oct-30 Oct**	Static Data Members, Static member functions, Nested and Local Class, Accessing Members of Class and Structure. Constructor, Initialization using constructor, types of constructor–
31 Oct, 2021	**Sunday**
November, 2021 **1st Week** **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	Default, Parameterized & Copy Constructors, Constructor overloading, Default Values to Parameters, Destructors. Revision of Topics and Test
14 Nov, 2021	**Sunday**
3rd Week **15 Nov-20 Nov**	Various programs of Static members and Constructor
19 Nov, 2021	**Guru Nanak Dev Jayanti**
21 Nov, 2021	**Sunday**
4th Week **22 Nov-27**	Polymorphism: Operators in C++, Precedence and Associativity Rules, Operator Overloading, Unary & Binary Operators Overloading
28 Nov, 2021	**Sunday**
Dec, 2021 **1st Week** **29 Nov-04 Dec**	Function Overloading, Inline Functions Group Discussion and Tests
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Manipulators, Friend Function, Friend Class. Array of Objects, Passing and Returning Objects to Functions.
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	String Handling in C++. Dynamic Memory Management.

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Harbinder Kaur
Subject- Computer Science
Paper- BCA-231 (Object Oriented Programming using C++)
Class- BCA 3rd Sem

19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	Pointers, new and delete Operator, Array of Pointers to Objects This Pointer, how to use pointer in array and functions as parameter or as return type.
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	Passing Parameters to Functions by Reference & pointers.
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	Discuss important topics for Exam
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 15 Jan**	Discuss Previous Topics
16 Jan ,2022	**Sunday**
3rd week **17 Jan – 22 Jan**	Console I/O: Hierarchy of Console Stream Classes, Unformatted and Formatted I/O Operations.
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan,** **31 Jan**	**Sessional Exams**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **1 Feb-4 Feb**	**Discuss various program of Pointer and references**
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Revision of Syllabus and Class Tests
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 19 Feb**	Revision of Syllabus and Class Tests

KVA DAV College for Women, Karnal
Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher- Ms. Harbinder Kaur
Class-M.Sc Computer Science (Software) 3rd Sem.
Subject- MS-15-31 (OBJECT ORIENTED ANALYSIS AND DESIGN USING UML)

October, 2021 **2nd Week** **11 Oct-16 Oct**	Modeling as a Design Technique: Abstraction, Encapsulation, Modularity. Hierarchy, Typing, Concurrency, Persistence of objects. Purpose of modeling.
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
3rd Week **18 Oct-23 Oct**	Class Model – Object & Class, Links & Associations Generalization & Inheritance, Association Ends - Multiplicity, Role names, Ordering
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
4th Week **25 Oct-30 Oct**	Qualification, Aggregation, Link attributes & Link class, Abstract class, Metadata, Constraints. Constructing class diagram.
31 Oct, 2021	**Sunday**
November, 2021 **1st Week** **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	State Modeling: Event, State, Activity, Action, Transitions & Conditions, State diagrams, Nested state diagrams.
14 Nov, 2021	**Sunday**
3rd Week **15 Nov-20 Nov**	Signal generalization, concurrency, relationships between class and state models. Discussions
19 Nov, 2021	**Guru Nanak Dev Jayanti**
21 Nov, 2021	**Sunday**
4th Week **22 Nov-27**	Interaction Modeling: use case models, use case relationships, sequence models, procedural sequence models, activity models, special constructs for activity models.
28 Nov, 2021	**Sunday**
Dec, 2021 **1st Week** **29 Nov-04 Dec**	System Analysis & design: System development stages, system conception.
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	analysis, domain class model, domain state model, iterating the analysis. Application interaction model, application class model, application state model, adding operations.
12 Dec,2021	**Sunday**

KVA DAV College for Women, Karnal
Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher- Ms. Harbinder Kaur
Class-M.Sc Computer Science (Software) 3rd Sem.
Subject- MS-15-31 (OBJECT ORIENTED ANALYSIS AND DESIGN USING UML)

3rd week **13 Dec -18 Dec**	System Design: estimating performance, make a reuse plan, organize the system into subsystem, identifying concurrency, allocating subsystems to processors and tasks, management of data stores,
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	Handling global resources.
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	choosing software control strategies, handling boundary conditions, setting trade-off priorities, selecting an architect style
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	Class Design: bridging gap, realize use cases with operations
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 15 Jan**	Designing algorithms, design optimization, adjustment of inheritance, organize classes & associations.
16 Jan ,2022	**Sunday**
3rd week **17 Jan – 22 Jan**	UML: Principles of modeling, UML Things – Structural, Behavioral, Grouping, Annotational
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan,** **31 Jan**	**Sessional Exam**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2021 1st week **1 Feb-4 Feb**	Overview of diagrams in UML – Class diagram, Object diagram, Use-Case diagram, Sequence diagram, Collaboration diagram, Statechart diagram.
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Relationships in UML – Dependency, Association, Generalization, Realization. Activity diagram, Component diagram, Deployment diagram. UML Semantic Rules – Names, Scope, Visibility, Integrity, Execution Mechanisms in the UML – Specifications, Adornments, Common Divisions, Extensibility Mechanisms.
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 19 Feb**	Revision of Syllabus and Class Tests

KVA DAV College for Women, Karnal
Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Neha Sharma

Class-M.Sc. 1st Sem

Subject- Discrete Mathematics Structures

3rd Week **15 Nov-20 Nov**	Set Theory: Basic Set Theory, Operations on Sets
19 Nov, 2021	**Guru Nanak Dev Jayanti**
21 Nov, 2021	**Sunday**
4th Week **22 Nov-27**	Algebra of sets, Venn Diagrams. Relations: Binary Relations, Complement of relations, Inverse of relations, Composite relations, Properties, Equivalence
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov-04 Dec**	Partial Order and Total order relations. Functions: Functions on Set, Domain, Co-domain, Representation of Functions, Types, Identity and Inverse Functions,
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Composition of FunctionsPropositional Calculus: Propositional logic, Equivalences, Predicates , Quantifiers, Nested Quantifiers, Rules of Inference,
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	Normal Forms, Proofs: Methods, Strategy. Counting: Counting Principles.
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	Counting Principles.Cont.,Pigeonhole Principle, Inclusion-Exclusion Principle, Permutations and Combinations, Binomial Coefficients Problems to be taken from students
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	Advanced Counting Techniques: Recurrence Relations, Solving Recurrence Relations, Divide and Conquer Algorithms
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	Recurrence Relations, Solution of Recurrence, Relations by the method of Generating Function..
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 15 Jan**	Lattices and Boolean algebra:Lattices, Hasse Diagram, Principle of Duality ,Types of Lattices, Special Lattices, Boolean Expression
16 Jan ,2022	**Sunday**
3rd week **17 Jan – 22 Jan**	Equivalent circuits, Dual, Normal Forms,Graphs: Introduction, Terminology, Types of Graphs, Representation of Graphs, Paths and Circuits
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan,** **31 Jan**	**Sessional Exam**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **1 Feb-4 Feb**	Cut-set and Cut - Vertices, Graph Isomorphism, Homomorphism, Connectivity,Bipartite Graphs, Subgraphs, Operations on Graphs, Euler and Hamiltonian Graphs, Shortest Path Problem,
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Planar & Dual Graphs, Coloring,Tree: Tree Notations, Properties of tree, Types of Tree, Operations,
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 19 Feb**	Operations continued, Minimum Spanning Tree (MST). Problems taken from students

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Neha Sharma
Subject- Computer Science
Paper- BCA-232 [Data Structure]
Class- BCA 3rd Sem

October, 2021 **2nd Week** **11 Oct-16 Oct**	Introduction: Elementary data organization, Data Structure definition Data type vs. data structure, Categoriesof data structures.
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
3rd Week **18 Oct-23 Oct**	Data structure operations ,Applications of data structures, Algorithms complexity and time-space tradeoff, Big-O notation
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
4th Week **25 Oct-30 Oct**	Strings: Introduction, String strings, String operations, Pattern matching algorithms.
31 Oct, 2021	**Sunday**
November, 2021 **1st Week** **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	Arrays: Introduction, Linear arrays, Representation of linear arrayin memory
14 Nov, 2021	**Sunday**
3rd Week **15 Nov-20 Nov**	Traversal, Insertions, Deletion in an array, Multidimensional arrays, Parallel arrays, Sparce matrics
19 Nov, 2021	**Guru Nanak Dev Jayanti**
21 Nov, 2021	**Sunday**
4th Week **22 Nov-27**	Linked List: Introduction, Array vs. linked list, Representation of linked lists in memory, Traversal

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Neha Sharma
Subject- Computer Science
Paper- BCA-232 [Data Structure]
Class- BCA 3rd Sem

28 Nov, 2021	**Sunday**
Dec, 2021 **1st Week** **29 Nov-04 Dec**	Insertion, Deletion, Searching in a linked list
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Header linked list, Circular linked list, Two-way linked list, Garbage Collection
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	Applications of linked lists. Algorithms for Insertion, deletion in array
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	Applications of stacks: Polish notation, Recursion. Queues: Introduction, Array and linked representation of queues,
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	Operations on queues, Deques, Priority Queues, Applications of queues.
2 Jan ,2022	**Sunday**
Jan ,2022 **1st week** **3 Jan – 8 Jan**	Problems taken regarding first three units and tests
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Neha Sharma
Subject- Computer Science
Paper- BCA-232 [Data Structure]
Class- BCA 3rd Sem

2nd week 10 Jan – 15 Jan	Tree: Introduction, Definition, Representing Binary tree in memory,
16 Jan ,2022	**Sunday**
3rd week 17 Jan – 22 Jan	Traversing binary trees, Traversal algorithms using stacks and using recursion.
23 Jan ,2022	**Sunday**
4th Week 24 Jan – 29 Jan, 31 Jan	**Sessional Exams**
26 Jan, 2022 30 Jan ,2022	**Republic Day** **Sunday**
Feb, 2022 1st week 1 Feb-4 Feb	Graph: Introduction, Graph theory terminology, Sequentialand linked representation of graphs.
5 Feb, 2022 6 Feb ,2022	**Vasant Panchmi** **Sunday**
2nd week 7 Feb- 12 Feb	Problems discussed on tree traversal
13 Feb ,2022	**Sunday**
3rd week 14 Feb- 19 Feb	Revision of Syllabus and Class Tests

Name of the Teacher – Ms. Divya Vij
Class-M.Sc. 1st Semester
Subject- Data Structures and Algorithms

3rd Week **November 15-20, 2021**	Introduction to Data Structures: Classification of Data Structures, Arrays, Stacks, Representation of Stacks, Stack Operations, Applications, Queues, Operations on Queues.
November 19, 2021 **November 21, 2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
4th Week **November 22-27, 2021**	Circular Queues, Dequeue, Priority Queues, Applications. Linked Lists: Introduction, Types, Operations (Insertion, Deletion, Traversal. Linked Lists: Searching, Sorting), Applications, Dynamic Memory Management and Implementation of Linked Representations.
November 28, 2021	**Sunday**
December 2021 **1st Week** **November 29- December 04, 2021**	Trees: Definition, Representation of Trees, Types of Tree, Representation of Binary Trees, Binary Tree Traversals, Threaded Binary Trees, Binary Search Trees and Operations, Minimum Spanning Tree, AVL Trees, Heap, m-way Search Trees, B-Trees, B+ Trees, Applications.
December 05, 2021	**Sunday**
2nd Week **December 06-11, 2021**	Graphs: Definitions and Basic Terminologies, Representation of Graphs, Graph Traversals, Shortest Path Problem, Applications.
December 12,2021	**Sunday**
3rd Week **December 13-18, 2021**	Introduction to Algorithms: Role of algorithms in computing, Complexity of algorithms, Analyzing algorithms, designing algorithms, asymptotic notations.
December 19, 2021	**Sunday**
4th Week **December 20-24, 2021**	Divide and Conquer: Complexity of iterative programs and recursive programs, solving recurrence equations: back substitution method, recursion tree method, masters theorem.
December 25, 2021 **December 26, 2021**	**Christmas** **Sunday**
1st Week **27 December 27, 2021- January 01, 2022**	Dynamic Programming (DP): Elements of DP, Matrix chain multiplication, Longest common subsequence, optimal binary search trees.
January 02, 2022	**Sunday**
January 2022 **2nd Week** **January 03-08, 2022**	Greedy Techniques (GT): Elements of GT, Activity selection problem, Huffman codes, Knapsack Problem.
January 09, 2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
3rd Week **January 10-15, 2022**	Graph Algorithms: Single source shortest path: Analysis of Dijkstra's Algorithm, Limitations of Dijkstra's Algorithm, Negative weight cycle, Bellman-Ford algorithm.
January 16, 2022	**Sunday**
4th Week **January 17-22, 2022**	All Pairs Shortest Path: Relation of Shortest path and matrix multiplication, Analysis of Floyd Warshall algorithm. Maximum Flow: Flow network, Ford- Fulkerson method.

Name of the Teacher – Ms. Divya Vij
Class-M.Sc. 1st Semester
Subject- Data Structures and Algorithms

January 23, 2022	**Sunday**
5th Week **January 24-29, 2022**	**Sessional Exam**
January 26, 2022 **January 30, 2022**	**Republic Day** **Sunday**
February 2022 **1st Week** **January 31-February 04, 2022**	Computational complexity: Notion of Polynomial time algorithms, Complexity classes: P, NP, NP-Hard and NP Complete, Polynomial time verification, Reducibility, NP-Completeness.
February 05, 2022 **February 06, 2022**	**Vasant Panchmi** **Sunday**
2nd Week **February 07-12, 2022**	Analysis of heap sort and quick sort; Counting sort, Radix sort, Bucket sort, Lower bounds for sorting, Advanced Trees: Introduction to 2-3 Tree, Red black Tree, Splay Trees.
February 13, 2022	**Sunday**
3rd Week **February 14-19, 2022**	Revision of the Syllabus

Name of the Teacher – Ms. Divya Vij
Class- B.Sc. II CS & B.A. II CS
Paper-I (Data Structures)

October 2021 3rd Week **October 11-13, 2021**	Introduction: Elementary data organization, Data Structure definition, Data type vs. data structure, Categories of data structures, Data structure operations, Applications of data structures
October 15, 2021 **October 17, 2021**	**(Dussehra)** **Sunday**
4th Week **October 18-19, 2021**	Algorithms complexity and time-space tradeoff, Big-O notation.
October 20, 2021 **October 24, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
5th Week **October 25-27, 2021**	Strings: Introduction, strings, String operations, Pattern matching algorithms
October 31, 2021	**Sunday**
November 2021 1st Week **November 01-07, 2021**	**(Haryana Day)** **Diwali Holidays**
2nd Week **November 08-10, 2021**	Arrays: Introduction, Linear arrays, Representation of linear array in memory, Traversal, Insertions, Deletion in an array.
November 14, 2021	**Sunday**
3rd Week **November 15-17, 2021**	Insertions, Deletion in an array, Multidimensional arrays, Parallel arrays, Sparse matrix. Linked List: Introduction, Array vs. linked list, Representation of linked lists in memory,
November 19, 2021 **November 21, 2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
4th Week **November 22-24, 2021**	Traversal, Insertion, Deletion, Searching in a linked list, Header linked list, Circular linked list.
November 28, 2021	**Sunday**
1st Week **November 29-30,** **December 01, 2021**	Applications of linked lists. Algorithm of insertion/ deletion in SLL, Two-way linked list, Garbage collection.
December 05, 2021	**Sunday**
2nd Week **December 06-08, 2021**	Stack: primitive operation on stack, algorithms for push and pop. Representation of Stack as Linked List and array.
December 12, 2021	**Sunday**
3rd Week **December 13 -15, 2021**	Stacks applications: polish notation, recursion, Multidimensional arrays, Parallel arrays, Sparse matrix.
December 19, 2021	**Sunday**

Name of the Teacher – Ms. Divya Vij
Class- B.Sc. II CS & B.A. II CS
Paper-I (Data Structures)

4th Week **December 20-22, 2021**	Introduction to queues, Primitive Operations on the Queues, Circular queue.
December 25, 2021 **December 26, 2021**	**Christmas** **Sunday**
5th Week **December 27-29, 2021**	Priority queue, Representation of Queues as Linked List and array.
January 02, 2022	**Sunday**
January 2022 1st Week **January 03-05, 2022**	Applications of queue. Algorithm on insertion and deletion in simple queue and circular queue.
January 09, 2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**
2nd Week **January 10-12, 2022**	Trees- Basic Terminology, representation, Binary Trees, Tree Representations using Array & Linked List, Basic operation on Binary tree
January 16, 2022	**Sunday**
3rd Week **January 17-19, 2022**	Traversal of binary trees:- In order, Preorder & post order, Applications of Binary tree.
January 23, 2022	**Sunday**
4th Week **January 24-29, 2022**	**Sessional Exam**
January 26, 2022 **January 30, 2022**	**Republic Day** **Sunday**
February 2021 1st Week **31 January 31, February 01-02, 2022**	Algorithm of tree traversal with and without recursion.
February 05, 2022 **February 06, 2022**	**Vasant Panchmi** **Sunday**
2nd Week **February 07-09, 2022**	Introduction to graphs, Definition, Terminology, Directed, Undirected & Weighted graph, Representation of graphs.
February 13, 2022	**Sunday**
3rd Week **February 14-15, 2022**	**Revision of all Syllabus**

KVA DAV College for Women, Karnal
Lesson Plan Odd Semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Divya Vij
Class- B.Sc. II CS & B.A. II CS
Paper-II (Software Engineering)

October 2021 3rd Week **October 14-16, 2021**	Introduction: Program vs. Software, Software Engineering, Programming paradigms.
October 15, 2021 **October 17, 2021** **October 20, 2021**	**Dussehra** **Sunday** **Maharishi Valmiki Jayanti**
4th Week **October 21-23, 2021**	Software Crisis – problem and causes, Phases in Software development: Requirement Analysis, Software Design, Coding, Testing, Maintenance.
October 24, 2021	**Sunday**
5th Week **October 28-30, 2021**	Software Development Process Models: Waterfall, Prototype, Evolutionary and Spiral models, Role of Metrics.
October 31, 2021	**Sunday**
November 2021 1st Week **November 01-07, 2021**	**Haryana Day** **Diwali Holidays**
2nd Week **November 11-13, 2021**	Feasibility Study, Software Requirement Analysis and Specifications: SRS.
November 14, 2021	**Sunday**
3rd Week **November 18 & 20, 2021**	Need for SRS, Characteristics of an SRS, Components of an SRS, Problem Analysis, Information gathering tools.
November 19, 2021 **November 21, 2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
4th Week **November 25-27, 2021**	Organising and structuring information, Requirement specification, validation and metrics.
November 28, 2021	**Sunday**
1st Week **December 01-03, 2021**	Structured Analysis and Tools: Data Flow Diagram, Data Dictionary, Decision table, Decision trees, Structured English, Entity-Relationship diagrams .
December 05, 2021	**Sunday**
2nd Week **December 09-11, 2021**	Software Project Planning, Cost estimation: COCOMO model, Project scheduling, Staffing and personnel planning, team structure.
December 12, 2021	**Sunday**
3rd Week **December 16-18, 2021**	Software configuration management, Quality assurance plans, Project monitoring plans, Risk Management.
December 19, 2021	**Sunday**

KVA DAV College for Women, Karnal
Lesson Plan Odd Semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Divya Vij
Class- B.Sc. II CS & B.A. II CS
Paper-II (Software Engineering)

4th Week **December 23-25, 2021**	Software testing strategies: unit testing.
December 25, 2021 **December 26, 2021**	**Christmas** **Sunday**
1st Week **December 30-31, 2021** **January 01, 2022**	Integration testing, V and V, System testing.
January 02, 2022	**Sunday**
January 2022 2nd Week **January 06-08, 2022**	Alpha and Beta testing, Black box testing.
January 09, 2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**
3rd Week **January 13-15, 2022**	White box testing, Cyclomatic Complexity.
January 16, 2022	**Sunday**
4th Week **January 20-22, 2022**	Software Implementation and Maintenance: Type of maintenance**.**
January 23, 2022	**Sunday**
5th Week **January 24-29, 2022**	**Sessional Exam**
January 26, 2022 **January 30, 2022**	**Republic Day** **Sunday**
February 2021 1st Week **February 03-05, 2022**	Management of Maintenance, Maintenance Process, maintenance characteristics.
February 05, 2022 **February 06, 2022**	**Vasant Panchmi** **Sunday**
2nd Week **February 10-12, 2022**	Revision of Syllabus.
February 13, 2022	**Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper- Windows and PC-Software (BCA-112)
Class- BCA-I

October, 2021 **2nd Week** **8 Oct-9 Oct**	Introduction to Windows and its Features,
3rd Week **11 Oct-16 Oct**	Hardware Requirements ofWindows. Windows Concepts, Windows Structure, Desktop, Taskbar, Start Menu, My Pictures, My Music, My Documents, Recycle Bin.
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
4th Week **18 Oct-23 Oct**	Managing Files, Folders and Disk .My Computer, Windows Explorer and its Facilities, Using CD, DVD, Pen Drive, BurningCD.
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
5th Week **25 Oct-30 Oct**	Windows Accessories. Entertainment- Media Players, Sound Recorder, Volume Control.
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	Managing Hardware & Software - Installation of Hardware & Software, Using Scanner, WebCamera, Printers. System Tools - Backup, Character Map, Clipboard Viewer, DiskDefragmenter, Drive Space, Scandisk, System Information, System Monitor, Disk Cleanup,
14 Nov, 2021	**Sunday**
3rdWeek **15 Nov-20 Nov**	Using Windows Update. Browsing the Web with Internet Explorer, Multiple User Features of Windows, Creating and Deleting User, Changing User Password, etc.
19 Nov, 2021	**Guru Nanak Dev Ji's Birthday**
21 Nov, 2021	**Sunday**
4thWeek **22 Nov-27 Nov**	Accessibility Features of Windows - Sharing Folders and Drives, Browsing the Entire Network, Using Shared Printers. Control Panel & its components

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper- Windows and PC-Software (BCA-112)
Class- BCA-I

28 Nov, 2021	**Sunday**
Dec, 2021 1ˢᵗ Week **29 Nov -04 Dec**	Introduction and area of use, Working with Excel, Toolbars, Menus and Keyboard Shortcuts, concepts of Workbook & Worksheets, Using Wizards, Various Data Types,
05 Dec, 2021	**Sunday**
2ⁿᵈ Week **06 Dec -11 Dec**	Using different features with Data, Cell and Texts, Inserting, Removing & Resizing of Columns & Rows,
12 Dec,2021	**Sunday**
3ʳᵈ week **13 Dec -18 Dec**	Working with Data & Ranges, Different Views of Worksheets,
19 Dec,2021	**Sunday**
4ᵗʰ Week **20 Dec-24 Dec**	Column Freezing, Labels, Hiding, Splitting etc., Using different features with Data and Text, Cell Formatting including Borders & Shading
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5ᵗʰ Week **27 Dec -01 Jan**	Multiple Worksheets: Concept, Creating and Using Multiple Worksheets;
2 Jan ,2022	**Sunday**
Jan ,2022 1ˢᵗ week **3 Jan – 8 Jan**	Use of Formulas
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper- Windows and PC-Software (BCA-112)
Class- BCA-I

2nd week **10 Jan – 15 Jan**	Calculations & Functions, Various types of Functions
16 Jan ,2022	**Sunday**
3rdweek **17 Jan – 22 Jan**	Cell Referencing, Absolute and Relative Addressing, Working with Different Chart Types, Chart Wizard
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan**	**Sessional Exam**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **31 Jan -4 Feb**	Printing of Workbook & Worksheets with various options, Database: Creation,
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Sorting, Query and Filtering a Database; Creating and Using Macros; Pivot table & Pivot chart
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Syllabus**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper- Software Engineering(BCA-234)
Class- BCA II

October, 2021 **2nd Week** **8 Oct-9 Oct**	Program vs. Software, Software Engineering
3rd Week **11 Oct-16 Oct**	Programming paradigms, Software Crisis – problem and causes, Phases in Software development
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
4th Week **18 Oct-23 Oct**	Requirement Analysis, Software Design, Coding, Testing, Maintenance
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
5th Week **25 Oct-30 Oct**	Software Development Process Models: Waterfall, Prototype
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	Evolutionary and Spiral models, Role of Metrics.
14 Nov, 2021	**Sunday**
3rd Week **15 Nov-20 Nov**	Feasibility Study, Software Requirement Analysis and Specifications
19 Nov, 2021	**Guru Nanak Dev Ji's Birthday**
21 Nov, 2021	**Sunday**
4th Week **22 Nov-27 Nov**	SRS, Need for SRS, Characteristics of an SRS, Components of an SRS, Problem Analysis

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper- Software Engineering(BCA-234)
Class- BCA II

28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov -04 Dec**	Information gathering tools, Organizing and structuring information,
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Requirement specification, validation and Verification.. Software Configuration Management(SCM)
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	Structured Analysis and Tools: Data Flow Diagram, Data Dictionary,Decision table, Decision tress, Structured English
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	Entity-Relationship diagrams, Cohesion and Coupling. Gantt chart, PERT Chart,
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	Software Maintenance: Type of maintenance,Management of Maintenance, Maintenance Process, maintenance characteristics.
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	Software Project Planning: Cost estimation: COCOMO model,
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper- Software Engineering(BCA-234)
Class- BCA II

2nd week **10 Jan – 15 Jan**	Project scheduling ,Staffing and personnel planning, team structure,
16 Jan ,2022	**Sunday**
3rdweek **17 Jan – 22 Jan**	Software configuration management, Quality assurance plans, Project monitoring plans
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan**	Sessional Exam
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **31 Jan -4 Feb**	Risk Management.
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Software testing strategies: unit testing, integration testing, Validation testing, System testing, Alpha and Beta testing
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Syllabus**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper-I (Desktop Publishing)
Class- B.Sc. III CA

October, 2021	
3rd Week **11 Oct-13 Oct**	Desktop Publishing: Concept, Need and Applications; Hardware and Software requirements for DTP
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
4th Week **18 Oct-19 Oct**	An Overview and comparison between DTP packages, Common features of DTP.
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
5th Week **25 Oct-27 Oct**	Introduction to Page Maker: Features, System Requirements, Components of Page Maker Window
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-10 Nov**	Introduction to Menu and Toolbars, PageMaker Preferences
14 Nov, 2021	**Sunday**
3rdWeek **15 Nov-17Nov**	Creating of Publications: Starting PageMaker, Setting Page size, Placing the text Formatting the text:
19 Nov, 2021	**Guru Nanak Dev Ji's Birthday**
21 Nov, 2021	**Sunday**
4thWeek **22 Nov-24 Nov**	Character Specification Paragraph setting: Paragraph Specification, Paragraph Rules,

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper-I (Desktop Publishing)
Class- B.Sc. III CA

28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov -01 Dec**	Spacing, Indents/Tabs, Define Styles, Hyphenation
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -8 Dec**	Header & Footer, Page Numbering, Saving and Closing publication
12 Dec,2021	**Sunday**
3rd week **13 Dec -15 Dec**	Editing Publication: Open a publication ,Story editor, Find and change the text, Change character and Paragraph attributes
19 Dec,2021	**Sunday**
4th Week **20 Dec-22 Dec**	Spell checking ,Selecting text, Cut, Copy, Paste, Paste multiple, Working with columns, Control palette: Manipulating objects, formatting the text, Book, Table of Contents,
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -29 Dec**	Creating Index, Index entry, Show Index, Print Working with Graphics: Insert Objects, Paste Special, Linking the graphics, Link the option, Link Information, editing original ,
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 5 Jan**	Text wrap, Bring to Front, Send to Back, Reversing the Text.
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper- I (Desktop Publishing)
Class- B.Sc. III CA

2nd week **10 Jan – 12 Jan**	Working with Frame: Introduction, Creating Frames, editing, Frame options, Dialog Box, Text Frame
16 Jan ,2022	**Sunday**
3rdweek **17 Jan – 19 Jan**	Working with colors: Introduction, Applying colors, Replacing &removing colours, Editing a color
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan**	**Sessional Exam**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **31 Jan ,1-2 Feb**	Working with Table: Setting &creating a new table, Close table, Selecting text, Cell rows & columns ,Typing, Editing & Formatting text in table, Cutting, Copying & Pasting Information
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 9 Feb**	Setting up Master Pages: Design a Grid, Guiding the Grid, Understanding Master Pages, Rulers options.
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Syllabus**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper-II (Programming Using C++)
Class- B.Sc. III CA

October, 2021 **2nd Week** **8 Oct-9 Oct**	Object-Oriented programming features and benefits. Object-Oriented features of C++
3rd Week **14 Oct-16 Oct**	Class and Objects, Data Hiding & Encapsulation, Structures,
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
4th Week **21 Oct-23 Oct**	Data members and Member functions, Scope resolution operator and its significance,
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
5th Week **28 Oct-30 Oct**	Static Data Members, Static member functions, Nested and Local Class, Accessing Members of Class and Structure.
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **11 Nov-13 Nov**	Constructor, Initialization using constructor, types of constructor– Default, Parameterized & Copy Constructors
14 Nov, 2021	**Sunday**
3rd Week **18 Nov-20 Nov**	Constructor Overloading, Default Values to Parameters, Destructors,
19 Nov, 2021	**Guru Nanak Dev Ji's Birthday**
21 Nov, 2021	**Sunday**
4th Week **25 Nov-27 Nov**	Console I/O:Hierarchy of Console Stream Classes, Unformatted and Formatted I/O Operations

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper- II (Programming Using C++)
Class- B.Sc. III CA

28 Nov, 2021	**Sunday**
Dec, 2021 **1st Week** **02 -04 Dec**	Manipulators, Friend Function, Friend Class
05 Dec, 2021	**Sunday**
2nd Week **09 Dec -11 Dec**	Arrays, Array of Objects
12 Dec,2021	**Sunday**
3rd week **16 Dec -18 Dec**	Passing and Returning Objects to Functions,
19 Dec,2021	**Sunday**
4th Week **23 Dec-24 Dec**	String Handling in C++
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **30 Dec-31 Dec,** **1 Jan**	Dynamic Memory Management: Pointers, new and delete Operator,
2 Jan ,2022	**Sunday**
Jan ,2022 **1st week** **6 Jan – 8 Jan**	Array of Pointers to Objects, this Pointer, Passing Parameters to Functions by Reference & pointers.
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper-II (Programming Using C++)
Class- B.Sc. III CA

2nd week **13 Jan – 15 Jan**	Polymorphism: Operators in C++, Precedence and Associativity Rules, Operator Overloading
16 Jan ,2022	**Sunday**
3rd week **20 Jan – 22 Jan**	Unary & Binary Operators Overloading
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan**	**Sessional Exam**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **3 Feb -4 Feb**	Function Overloading
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **10 Feb- 12 Feb**	Inline Functions
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Syllabus**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper-II (Web Designing)
Class- B.A. III (Computer Science)

October, 2021	
3rd Week **11 Oct-13 Oct**	Introduction to Internet and World Wide Web; Evolution and History of World Wide Wbe
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
4th Week **18 Oct-19 Oct**	Basic Features of WWW, Web Browsers
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
5th Week **25 Oct-27 Oct**	Web Servers; Hypertext Transfer Protocol;
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-10 Nov**	URLs; Searching and Web- Casting Techniques
14 Nov, 2021	**Sunday**
3rdWeek **15 Nov-17Nov**	Search Engines and Search Tools
19 Nov, 2021	**Guru Nanak Dev Ji's Birthday**
21 Nov, 2021	**Sunday**
4thWeek **22 Nov-24 Nov**	Steps for Developing Website; Choosing the Contents; Home Page; Domain Names

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper-II (Web Designing)
Class- B.A. III (Computer Science)

28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29-30 Nov, 01 Dec**	Internet Service Provider
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -8 Dec**	Planning and Designing Web Site; Creating a Website;
12 Dec,2021	**Sunday**
3rd week **13 Dec -15 Dec**	Web Publishing: Hosting Site;
19 Dec,2021	**Sunday**
4th Week **20 Dec-22 Dec**	Introduction to HTML; Hypertext and HTML; HTML Document Features; HTML Tags;
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -29 Dec**	Header, Title, Body, Paragraph, Ordered/Unordered Line, Creating Links; Headers;
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 5 Jan**	Text Styles; Text Structuring; Text Colors and Background;
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Mamta Atreja
Subject- Computers
Paper-II (Web Designing)
Class- B.A. III (Computer Science)

2nd week **10 Jan – 12 Jan**	Formatting Text; Page layouts; Insertion of Text, Movement of Text
16 Jan ,2022	**Sunday**
3rdweek **17 Jan – 19 Jan**	Images: Types of Images, Insertion of Image, Movement of Image, Ordered and Unordered lists;
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan**	**Sessional Exam**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **31 Jan ,1-2 Feb**	Inserting Graphics; Table Handling Functions like Columns, Rows, Width, Colours; Frame
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 9 Feb**	Creation and Layouts; Working with Forms and Menus; Working with Buttons like Radio, Check Box
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Syllabus**

KVA DAV College for Women, Karnal
Lesson Plan Odd Semester
(October 2021 to February 2022)

Name of the Teacher–Ms. Prashantika P Sanduja
Class - M.Sc. CS 3rd Semester
Subject-Computer Networks (MS-15-33)

3rd Week **November 15-20, 2021**	Introduction to Computer Networks and its uses; Network categorization and Hardware; Topologies; Network Software: Protocols, Services, Network Architecture, Design issues for the layers
November 19, 2021 **November 21, 2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
4th Week **November 22-27, 2021**	OSI Reference model, TCP/IP Reference model, Comparison of OSI and TCP/IP Models, Introduction to Example Networks: Internet, ISDN, X.25, Frame Relay, ATM.
November 28, 2021	**Sunday**
December 2021 1st Week **November 29-** **December 04, 2021**	Data Communication Model, Digital and Analog data and signals, Asynchronous and Synchronous transmission; bit rate, baud, bandwidth, Transmission impairment; Channel Capacity; Guided Transmission Media; Wireless Transmission, Satellite communication
December 05, 2021	**Sunday**
2nd Week **December 06-11, 2021**	Switching; Multiplexing; Spread Spectrum; local loop; Modems and ADSL, Encoding: NRZ, NRZ-I, Manchester and Differential Manchester encoding, Internet over Cable; ADSL Versus Cable; The Mobile Telephone System
December 12,2021	**Sunday**
3rd Week **December 13-18, 2021**	Revision of Unit I
December 19, 2021	**Sunday**
4th Week **December 20-24, 2021**	Revision of Unit II
December 25, 2021 **December 26, 2021**	**Christmas** **Sunday**
1st Week **27 December 27, 2021-** **January 01, 2022**	Data Link Layer Design issues; Framing, Error Detection and Correction; Flow Control: Sliding Window Protocols; Medium Access Control: Aloha, CSMA protocols, Collision free protocols, Limited Contention Protocols
January 02, 2022	**Sunday**
January2022 2nd Week **January 03-08, 2022**	Wavelength Division Multiple access protocol, Wireless LAN Protocol: MACA; High Speed LANs; Ethernet LAN, Fast Ethernet, Gigabit Ethernet; Binary Exponential Backoff algorithm; Token Ring and FDDI; Introduction to Wireless LANs
January 09, 2022	**Sunday(Sh.GuruGobindSingh'sBirthday)**
3rd Week **January 10-15, 2022**	Revision of Unit III
January 16, 2022	**Sunday**
4th Week **January 17-22, 2022**	Network Layer Design issues , Virtual Circuit and Datagram Subnet, Routing Algorithms: Optimality principle, Shortest path Routing, Flooding , Distance Vector Routing, Link State Routing, Hierarchical Routing

Name of the Teacher–Ms. Prashantika P Sanduja
Class - M.Sc. CS 3rd Semester
Subject-Computer Networks (MS-15-33)

January 23, 2022	**Sunday**
5th Week **January 24-29, 2022**	**Sessional Exam**
January 26, 2022 **January 30, 2022**	**Republic Day** **Sunday**
February 2022 1st Week **January 31-** **February 04, 2022**	Broadcast and Multi Cast Routing, Routing for Mobile hosts, Congestion Control Algorithms: General Principals; Congestion control in Virtual – Circuit Subnets, Congestion Control in Datagram Subnets: Choke packets, Load Shedding
February 05,2022 **February 06, 2022**	**Vasant Panchmi** **Sunday**
2nd Week **February 07-12, 2022**	Random Early Detection, Jitter Control; Quality of Service: Over provisioning, Buffering, Traffic Shaping, Leaky bucket, token bucket, Resource Reservation, Admission Control, Packet Scheduling
February 13, 2022	**Sunday**
3rd Week **February 14-19, 2022**	Revision of the Syllabus

KVA DAV College for Women, Karnal
Lesson Plan Odd Semester
(October 2021 to February 2022)

Name of the Teacher–Ms. Prashantika P Sanduja
Class - BCA 3ʳᵈ Semester
Subject-Computer Architecture (BCA-233)

3ʳᵈ Week **November 15-20, 2021**	Basic Computer Organisation and Design: Instruction Codes, Computer registers, Computer Instructions, Timing and Control, Instruction Cycle, Memory reference instructions
November 19, 2021 **November 21, 2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
4ᵗʰ Week **November 22-27, 2021**	Input-Output and Interrupt, Design of Basic computer, Design of accumulator logic
November 28, 2021	**Sunday**
December 2021 1ˢᵗ Week **November 29-** **December 04, 2021**	Register Transfer and Microoperations: Register Transfer Language (RTL), register transfer, Bus and Memory Transfers
December 05, 2021	**Sunday**
2ⁿᵈ Week **December 06-11, 2021**	Arithmetic Microoperations, Logic Microoperations, Shift Microoperations, Arithmetic Logic Shift Unit
December 12,2021	**Sunday**
3ʳᵈ Week **December 13-18, 2021**	Microprogrammed Control: Control memory; address sequencing, microprogram sequencer, Design of Control Unit
December 19, 2021	**Sunday**
4ᵗʰ Week **December 20-24, 2021**	Revision of Unit II
December 25, 2021 **December 26, 2021**	**Christmas** **Sunday**
1ˢᵗ Week **27 December 27, 2021-** **January 01, 2022**	Central Processing Unit: General registers Organization, Stack Organization.
January 02, 2022	**Sunday**
January2022 2ⁿᵈ Week **January 03-08, 2022**	Instruction formats, Addressing Modes, Data Transfer and Manipulation
January 09, 2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
3ʳᵈ Week **January 10-15, 2022**	Program Control, Program Interrupt, RISC, CISC
January 16, 2022	**Sunday**
4ᵗʰ Week **January 17-22, 2022**	Memory Organization: Memory hierarchy, Auxiliary Memory

Name of the Teacher–Ms. Prashantika P Sanduja
Class - BCA 3ʳᵈ Semester
Subject-Computer Architecture (BCA-233)

January 23, 2022	**Sunday**
5ᵗʰ Week **January 24-29, 2022**	**Sessional Exam**
January 26, 2022 **January 30, 2022**	**Republic Day** **Sunday**
February 2022 1ˢᵗ Week **January 31-** **February 04, 2022**	Associative Memory, Interleaved memory, Cache memory, Virtual Memory, Memory Management Hardware, Input Output Organization
February 05,2022 **February 06, 2022**	**Vasant Panchmi** **Sunday**
2ⁿᵈ Week **February 07-12, 2022**	Peripheral devices , Input-Output Interface, Asynchronous data Transfer, Modes of Transfer, Priority Interrupt, Direct Memory Access(DMA), Input-Output Processor(IOP).
February 13, 2022	**Sunday**
3ʳᵈ Week **February 14-19, 2022**	Revision of the Syllabus

KVA DAV College for Women, Karnal
Lesson Plan Odd Semester
(October 2021 to February 2022)

Name of the Teacher–Ms. Prashantika P Sanduja
Class – B.Sc. CS 1st Semester
Subject-Computer & Programming Fundamentals (Paper – I)

October 2021 **3rd Week** **October 11-13, 2021**	Computer Fundamentals: Definition, Functional components of computer, characteristics & classification of computers, Applications of computers in various fields
October 15, 2021 **October 17, 2021**	**(Dussehra)** **Sunday**
4th Week **October 18-19, 2021**	Memory: Concept of primary & secondary memory, RAM, ROM, types of ROM, Cache memory
October 20, 2021 **October 24, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
5th Week **October 25-27, 2021**	CPU Registers, flash memory, Secondary storage devices: Sequential & direct access devices viz. magnetic tape, magnetic disk, CD, DVD.
October 31, 2021	**Sunday**
November 2021 1st Week **November 01-07, 2021**	**(Haryana Day)** **Diwali Holidays**
2nd Week **November 08-10, 2021**	Computer hardware & software: I/O devices, definition of software, relationship between hardware and software
November 14, 2021	**Sunday**
3rd Week **November 15-17, 2021**	Types of software, motherboard, ports, Overview of operating system: Definition, Functions of Operating System
November 19, 2021 **November 21, 2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
4th Week **November 22-24, 2021**	Concept of multiprogramming, multitasking, multithreading, multiprocessing
November 28, 2021	**Sunday**
1st Week **November 29-30,** **December 01, 2021**	Time-sharing, real time, single-user & multi-user operating system, examples of various operating systems
December 05, 2021	**Sunday**
2nd Week **December 06-08, 2021**	Revision & Tests of Unit I
December 12, 2021	**Sunday**
3rd Week **December 13 -15, 2021**	Revision & Tests of Unit II
December 19, 2021	**Sunday**

KVA DAV College for Women, Karnal
Lesson Plan Odd Semester
(October 2021 to February 2022)

Name of the Teacher–Ms. Prashantika P Sanduja
Class – B.Sc. CS 1ˢᵗ Semester
Subject-Computer & Programming Fundamentals (Paper – I)

4ᵗʰ Week **December 20-22, 2021**	Planning the Computer Program: Concept of problem solving, Problem definition, Program design, Debugging
December 25, 2021 **December 26, 2021**	**Christmas** **Sunday**
5ᵗʰ Week **December 27-29, 2021**	Types of errors in programming, Documentation, Techniques of Problem Solving: Flowcharting, algorithms, pseudo code, decision table
January 02, 2022	**Sunday**
January 2022 1ˢᵗ Week **January 03-05, 2022**	Structured programming concepts, Programming methodologies viz. top-down and bottom-up programming
January 09, 2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2ⁿᵈ Week **January 10-12, 2022**	Searching, Sorting, and Merging: Linear & Binary Searching, Bubble Sorting,
January 16, 2022	**Sunday**
3ʳᵈ Week **January 17-19, 2022**	Selection Sorting, Insertion Sorting, Merging
January 23, 2022	**Sunday**
4ᵗʰ Week **January 24-29, 2022**	**Sessional Exam**
January 26, 2022 **January 30, 2022**	**Republic Day** **Sunday**
February 2021 1ˢᵗ Week **31 January 31,** **February 01-02, 2022**	Computer Languages: Analogy with natural language, machine language, assembly language, high-level language
February 05, 2022 **February 06, 2022**	**Vasant Panchmi** **Sunday**
2ⁿᵈ Week **February 07-09, 2022**	Language translators, characteristics of a good programming language
February 13, 2022	**Sunday**
3ʳᵈ Week **February 14-15, 2022**	**Revision of all Syllabus**

Name of the Teacher–Ms. Prashantika P Sanduja
Class – B.Sc. CS 1st Semester
Subject- PC Software (Paper – II)

October 2021 3rd Week **October 14-16, 2021**	Windows: Basics of Windows. Windows History, Basic components of windows, icons
October 15, 2021 **October 17, 2021** **October 20, 2021**	**Dussehra** **Sunday** **Maharishi Valmiki Jayanti**
4th Week **October 21-23, 2021**	Types of icons, taskbar, activating windows, using desktop, title bar, running applications
October 24, 2021	**Sunday**
5th Week **October 28-30, 2021**	Windows explorer, managing files and folders, Configuring System devices. Control panel, using windows accessories
October 31, 2021	**Sunday**
November 2021 1st Week **November 01-07, 2021**	**Haryana Day** **Diwali Holidays**
2nd Week **November 11-13, 2021**	Documentation Using Word - Introduction to Office Automation, Creating & Editing Document.
November 14, 2021	**Sunday**
3rd Week **November 18 & 20, 2021**	Formatting Document, Auto-text, Autocorrect, Spelling and Grammar Tool
November 19, 2021 **November 21, 2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
4th Week **November 25-27, 2021**	Document Dictionary, Page Formatting, Bookmark, Advance Features of MS-Word-Mail
November 28, 2021	**Sunday**
1st Week **December 01-03, 2021**	Merge, Macros, Tables, File Management, Printing, Styles, linking and embedding object
December 05, 2021	**Sunday**
2nd Week **December 09-11, 2021**	Revision & Tests of Unit I
December 12, 2021	**Sunday**

KVA DAV College for Women, Karnal
Lesson Plan Odd Semester
(October 2021 to February 2022)

Name of the Teacher–Ms. Prashantika P Sanduja
Class – B.Sc. CS 1st Semester
Subject- PC Software (Paper – II)

3rd Week **December 16-18, 2021**	Revision & Tests of Unit II
December 19, 2021	**Sunday**
4th Week **December 23-25, 2021**	Electronic Spread Sheet using Excel - Introduction to MS-Excel, Creating & Editing Worksheet
December 25, 2021 **December 26, 2021**	**Christmas** **Sunday**
1st Week **December 30-31,2021** **January 01,2022**	Formatting and Essential Operations, Formulas and Functions, Charts,
January 02, 2022	**Sunday**
January 2022 2nd Week **January 06-08, 2022**	Advance features of MS-Excel-Pivot table & Pivot Chart, Linking and Consolidation
January 09, 2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
3rd Week **January 13-15, 2022**	Database Management using Excel-Sorting, Filtering, Table, Validation, Goal Seek, Scenario
January 16, 2022	**Sunday**
4th Week **January 20-22, 2022**	Presentation using PowerPoint: Presentations, Creating, Manipulating & Enhancing Slides, Inserting Animated Pictures or Accessing through Object
January 23, 2022	**Sunday**
5th Week **January 24-29, 2022**	**Sessional Exam**
January 26, 2022 **January 30, 2022**	**Republic Day** **Sunday**
February 2021 1st Week **February 03-05, 2022**	Organizational Charts, Excel Charts, Word Art, Layering art Objects, Animations and Sounds, Inserting Recorded Sound Effect or In-Built Sound Effect.
February 05, 2022 **February 06, 2022**	**Vasant Panchmi** **Sunday**
2nd Week **February 10-12, 2022**	Revision of Syllabus.
February 13, 2022	**Sunday**

KVA DAV College for Women, Karnal
Lesson Plan Odd Semester
(October 2021 to February 2022)

Name of the Teacher–Ms. Prashantika P Sanduja
Class – B.Com. CA 5th Semester
Subject- System Analysis and Design (BC (VOC) – 506)

October 2021 **3rd Week** **October 14-16, 2021**	Introduction to System, Definition of system, characteristics of a system, elements of a system
October 15, 2021 **October 17, 2021** **October 20, 2021**	**Dussehra** **Sunday** **Maharishi Valmiki Jayanti**
4th Week **October 21-23, 2021**	Types of systems: Open & Closed systems, Deterministic and Probabalistic systems, Physical & Abstract systems, Man-made Information systems: Formal information system, informal information system
October 24, 2021	**Sunday**
5th Week **October 28-30, 2021**	Computer based systems: transaction processing systems, management information systems, decision support systems, office automation systems
October 31, 2021	**Sunday**
November 2021 **1st Week** **November 01-07, 2021**	**Haryana Day** **Diwali Holidays**
2nd Week **November 11-13, 2021**	System development Life Cycle: Introduction, Phases, consideration for system planning and control for system success, role of system analyst, qualities of system analyst: academic and personal qualities
November 14, 2021	**Sunday**
3rd Week **November 18 & 20, 2021**	System Planning & Investigation: Introduction, Basics of Planning, Dimensions of planning, project requests, User requirements and analysis, strategies for determining information requirement
November 19, 2021 **November 21, 2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
4th Week **November 25-27, 2021**	Fact finding process and techniques: Introduction, fact finding techniques: Record Inspections, Interviews, Questionnaires, On-site Observation, Tools for structured analysis: Data Flow diagrams, Data dictionary, Pseudo codes, Flow charts, Decision Trees, Decision Tables, Gantt Charts
November 28, 2021	**Sunday**
1st Week **December 01-03, 2021**	Feasibility study: Introduction, Objectives, Types of feasibility, steps in feasibility analysis, feasibility report, oral presentation, Cost-benefit analysis: Identification, Classification, selection of evaluation method
December 05, 2021	**Sunday**
2nd Week **December 09-11, 2021**	System design: Introduction, Process of system design, Design Methodologies, Structured Design: Modularization, Top Down Design, Structure Charts, Module Coupling & Cohesion , structured Walkthrough.
December 12, 2021	**Sunday**

KVA DAV College for Women, Karnal
Lesson Plan Odd Semester
(October 2021 to February 2022)

Name of the Teacher–Ms. Prashantika P Sanduja
Class – B.Com. CA 5th Semester
Subject- System Analysis and Design (BC (VOC) – 506)

3rd Week **December 16-18, 2021**	Input / Output & Form Design: Introduction, Objectives of Input Design, Input Data, Input Verification & Control, Design of Input Forms,Input CRT Screen designs, Output Design: Objectives, Output Technologies & Methods, Design of Output Reports, Designing Screen Outputs, Form design, Classification of forms, Requirements of form design, layout considerations, forms control
December 19, 2021	**Sunday**
4th Week **December 23-25, 2021**	File structure, file Organization, Sequential file organization, direct file organization, Indexed Sequential file organization, definition of database, objectives of database design, logical & physical view of data
December 25, 2021	**Christmas**
December 26, 2021	**Sunday**
1st Week **December 30-31,2021** **January 01,2022**	System Testing & Quality Assurance: Introduction, Definition & Objectives of Testing, Test Plan, Testing Techniques: Unit Testing, Integration Testing, Validation Testing- configuration Review, alpha & Beta Testing, System testing- Recovery, Security, stress, Performance Testing, Quality Assurance, Levels or Activities of Quality Assurance, Quality Assurance Goals in Systems Life Cycle.
January 02, 2022	**Sunday**
January 2022 2nd Week **January 06-08, 2022**	System Implementation, Types of Implementation, Process of Implementation, Conversion, User Training, Post – Implementation Review, Maintenance: Types, Activities of Maintenance Process, Reducing Maintenance Costs
January 09, 2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**
3rd Week **January 13-15, 2022**	System Documentation, Characteristics of Good Documentation, forms of Documentation
January 16, 2022	**Sunday**
4th Week **January 20-22, 2022**	Hardware / Software Selection: Procedure, Criteria, Evaluation Process
January 23, 2022	**Sunday**
5th Week **January 24-29, 2022**	**Sessional Exam**
January 26, 2022	**Republic Day**
January 30, 2022	**Sunday**
February 2021 1st Week **February 03-05, 2022**	System security: Introduction, Essence of Data sEcurity, Threats to System security, control Measures, Recovery concepts, Disaster / Recovery Planning
February 05, 2022	**Vasant Panchmi**
February 06, 2022	**Sunday**
2nd Week **February 10-12, 2022**	**Revision of whole syllabus**
February 13, 2022	**Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher-Ms. Tarjeet Kaur
Subject- Computers
Paper- MS-15-32 Advanced Database System
Class- M.Sc. II Computer Science

October, 2021 3rd Week **11 Oct-16 Oct**	Introduction to Database Systems
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
4th Week **18 Oct-23 Oct**	Three- Schema Architecture and Data Independence
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
5th Week **25 Oct-30 Oct**	ER Model Concepts, Naming Convention and Design Issues
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	Extended ER Model, Subclasses,Superclasses, Inheritance
14 Nov, 2021	**Sunday**
3rdWeek **15 Nov-20 Nov**	Specialization and Generalization, Constraints on Specialization and Generalization
19 Nov,2021	**Guru Nanak Dev Ji's Birthday**
21 Nov, 2021	**Sunday**
4thWeek **22 Nov-27**	Introduction to RDBMS, Relational Database system constraints

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher-Ms. Tarjeet Kaur
Subject- Computers
Paper- MS-15-32 Advanced Database System
Class- M.Sc. II Computer Science

28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov-04 Dec**	Introduction to object-oriented concepts, Object identity object structure
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Type constructors, Encapsulation of operations, Methods and Persistence
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	Type Hierarchies and Inheritance, Complex Object.
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	Steps to Query Processing and Optimization , Using Heuristics in Query Optimization
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	Database Tuning in Relational System
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	Architecture for parallel database, Distributed database concepts, Data fragmentation, Replication, and allocation techniques**.**
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher-Ms. Tarjeet Kaur
Subject- Computers
Paper- MS-15-32 Advanced Database System
Class- M.Sc. II Computer Science

2nd week **10 Jan – 15 Jan**	**Overview of Client-Server Architecture, Active Database Concept**
16 Jan ,2022	**Sunday**
3rdweek **17 Jan – 22 Jan**	Triggers, Temporal Databases Concepts
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan**	Spatial and Multimedia Databases, Deductive Databases
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **1 Feb-4 Feb**	XML Schema, Documents and Databases
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Introduction of Big Data, Classifications, The Simplest of Ontologies, Ontologies, Classes with Multiple Parents, Choosing a Class Model. Data Integration and Software Interoperability
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 19 Feb**	Versioning and Compliance Issues, Stepwise Approach to Big Data Analysis, Failures and Legalities.

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher-Ms. Tarjeet Kaur
Subject- Computers
Paper- BCA-351: Web Designing Fundamentals
Class- BCA III

October, 2021 3rd Week **11 Oct-16 Oct**	Introduction to Internet
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
4th Week **18 Oct-23 Oct**	History, Applications of Internet, Advantages and Disadvantages World Wide Web; Evolution and History of World Wide Web
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
5th Week **25 Oct-30 Oct**	Web Browsers, Types of web Browsers, BasicFeatures, Web Servers and its Working
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	Hypertext Transfer Protocol, URLs, Searching and Web-Casting Techniques, Search Engines and Search Tools
14 Nov, 2021	**Sunday**
3rdWeek **15 Nov-20 Nov**	Discuss Various Services of Internet, Revision and test of Unit-I
19 Nov,2021	**Guru Nanak Dev Ji's Birthday**
21 Nov, 2021	**Sunday**
4thWeek **22 Nov-27**	Introduction to website Development. Steps for Developing Website; Choosing the Contents; Home Page; Domain Names; Internet Service Provider.

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher-Ms. Tarjeet Kaur
Subject- Computers
Paper- BCA-351: Web Designing Fundamentals
Class- BCA III

28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov-04 Dec**	Web Publishing Tools, Hosting Website Revision of Unit 2 and test
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Introduction to HTML, History, Basic Structure of HTML document ,HTML Features
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	Steps to Create HTML Document ,HTML Tags: Header, Title, Body, Paragraph.
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	TextStyles, Text Structuring using html tags, Text Colors
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	Background; Formatting Text; Page layouts; Insertion ofText,Movement of Text
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	Creating Hyperlinks. Practice of some Programmes using html basic tags
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher-Ms. Tarjeet Kaur
Subject- Computers
Paper- BCA-351: Web Designing Fundamentals
Class- BCA III

2nd week **10 Jan – 15 Jan**	Images: Types of Images, Insertion of Image, Movement of Image
16 Jan ,2022	**Sunday**
3rdweek **17 Jan – 22 Jan**	Creating Ordered and Unordered lists,Inserting Graphics, HTML Table, Using Functions like Columns, Rows, Width, Colours
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan**	**Sessional Exam**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **1 Feb-4 Feb**	Frame Creation and Layouts
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Frame Creation and Layouts
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 17 Feb**	Working with Forms and Menus; Working with Buttons like Radio, CheckBox;

KVA DAV College for Women, Karnal

Lesson Plan Odd Semester

(October,2021 to February,2022)

Name of the Teacher–Ms. Tarjeet Kaur

Class- B.Sc. III CS

Paper-I (Fundamentals of Data Base Systems)

October 2021 **3rdWeek** **October 11-13, 2021**	Basic Concepts – Data, Information, Records and files. Traditional file Based Approach
October 15, 2021 **October 17, 2021**	**(Dussehra)** **Sunday**
4thWeek **October 18-19, 2021**	Limitations of Traditional File Based Approach Database Approach- Characteristics of Database Approach
October 20, 2021 **October 24, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
5thWeek **October 25-27, 2021**	Database Management System (DBMS), Components of DBMS Environment
October 31, 2021	**Sunday**
November 2021 **1st Week** **November 01-07, 2021**	**(Haryana Day)** **Diwali Holidays**
2nd Week **November 08-10, 2021**	DBMS Functions and Components, Advantages and Disadvantages of DBMS.
November 14, 2021	**Sunday**
3rdWeek **November 15-17, 2021**	Actors on the Scene - Data and Database Administrator, Database Designers, End users Applications Developers and Workers behind the Scene.
November 19, 2021 **November 21, 2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
4thWeek **November 22-24, 2021**	Database System Architecture – Three Levels of Architecture, Schemas – External, Conceptual and Internal Level
November 28, 2021	**Sunday**
1st Week **November 29-30, December 01, 2021**	Database Languages – VDL, DDL, SDL, DML, SQL, Mappings – External/ Conceptual and Conceptual/Internal
December 05, 2021	**Sunday**
2nd Week **December 06-08, 2021**	Instances, Data Independence – Logical and Physical Data Independence
December 12, 2021	**Sunday**
3rd Week **December 13 -15, 2021**	Data Models: High Level, Low Level and Representational – Records-based Data Models, Object-based Data Models, Physical Data Models and Conceptual Models
December 19, 2021	**Sunday**

KVA DAV College for Women, Karnal

Lesson Plan Odd Semester

(October,2021toFebruary,2022)

Name of the Teacher–Ms. Tarjeet Kaur
Class- B.Sc. III CS
Paper-I (Fundamentals of Data Base Systems)

4th Week **December 20-22, 2021**	Entity-Relationship Model – Concepts, Entity Types, Entity Sets, Attributes, Relationships,
December 25, 2021 **December 26, 2021**	**Christmas** **Sunday**
5th Week **December 27-29, 2021**	Constraints, Keys , Degree, Cardinality etc
January 02, 2022	**Sunday**
January 2022 **1st Week** **January 03-05, 2022**	ER Diagrams of any Database Organization- Inventory System, Payroll System, Reservation System, Online Book Store etc.
January 09, 2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**
2nd Week **January 10-12, 2022**	Classification of Database Management System, Centralized and Client Server architecture
January 16, 2022	**Sunday**
3rd Week **January 17-19, 2022**	Relational Data Model:-Brief History, Terminology in Relational Data Structure, Relations, Properties of Relations
January 23, 2022	**Sunday**
4th Week **January 24-29, 2022**	**Sessional Exam**
January 26, 2022 **January 30, 2022**	**Republic Day** **Sunday**
February 2021 **1st Week** **31 January 31, February 01-02, 2022**	Keys – Primary, Secondary, Composite, Candidate, Alternate and Foreign Key,
February 05, 2022 **February 06, 2022**	**Vasant Panchmi** **Sunday**
2nd Week **February 07-09, 2022**	Domains, Integrity Constraints over Relations.
February 13, 2022	**Sunday**
3rd Week **February 14-15, 2022**	**Revision of all Syllabus**

KVA DAV College for Women, Karnal

Lesson Plan Odd Semester

(October,2021 to February,2022)

Name of the Teacher–Ms. Tarjeet Kaur
Class- B.Sc. III CS
Paper-II (Paper-II: Web Designing)

October 2021 3rd Week **October 14-16, 2021**	Introduction to Internet and World Wide Web; Evolution and History of World Wide Web; Basic Features
October 15, 2021 **October 17, 2021** **October 20, 2021**	**Dussehra** **Sunday** **Maharishi Valmiki Jayanti**
4th Week **October 21-23, 2021**	Web Browsers; Web Servers; Hypertext Transfer Protocol; URLs
October 24, 2021	**Sunday**
5th Week **October 28-30, 2021**	Searching and WebCasting Techniques; Search Engines and Search Tools
October 31, 2021	**Sunday**
November 2021 1st Week **November 01-07, 2021**	**Haryana Day** **Diwali Holidays**
2nd Week **November 11-13, 2021**	Steps for Developing Website; Choosing the Contents; Home Page; Domain Names
November 14, 2021	**Sunday**
3rd Week **November 18 & 20, 2021**	Internet Service Provider; Planning and Designing Web Site; Creating a Website; Web Publishing: Hosting Site;
November 19, 2021 **November 21, 2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
4th Week **November 25-27, 2021**	Introduction to HTML; Hypertext and HTML; HTML Document Features; HTML Tags; Header, Title, Body, Paragraph
November 28, 2021	**Sunday**
1st Week **December 01-03, 2021**	Ordered/Unordered Line, Creating Links; Headers; Text Styles
December 05, 2021	**Sunday**
2nd Week **December 09-11, 2021**	Text Structuring; Text Colors and Background
December 12, 2021	**Sunday**
3rd Week **December 16-18, 2021**	Formatting Text; Page layouts; Insertion of Text, Movement of Text
December 19, 2021	**Sunday**

KVA DAV College for Women, Karnal

Lesson Plan Odd Semester

(October,2021toFebruary,2022)

Name of the Teacher–Ms. Tarjeet Kaur
Class- B.Sc. III CS
Paper-II (Paper-II: Web Designing)

4th Week **December 23-25, 2021**	Images: Types of Images, Insertion of Image, Movement of Image, Ordered and Unordered lists
December 25, 2021 **December 26, 2021**	**Christmas** **Sunday**
1st Week **December 30-31,2021** **January 01,2022**	Inserting Graphics; Table Handling Functions like Columns, Rows, Width, Colours
January 02, 2022	**Sunday**
January 2022 2nd Week **January 06-08, 2022**	Frame Creation and Layouts, Communication between frames
January 09, 2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**
3rd Week **January 13-15, 2022**	Practice of developing Web Pages.
January 16, 2022	**Sunday**
4th Week **January 20-22, 2022**	Revision and Test
January 23, 2022	**Sunday**
5th Week **January 24-29, 2022**	**Sessional Exam**
January 26, 2022 **January 30, 2022**	**Republic Day** **Sunday**
February 2021 1st Week **February 03-05, 2022**	Working with Forms and Menus; Working with Buttons like Radio, Check Box
February 05, 2022 **February 06, 2022**	**Vasant Panchmi** **Sunday**
2nd Week **February 10-12, 2022**	Revision of Syllabus.
February 13, 2022	**Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester

(November 2021 to February, 2022)

Name of the Teacher – Ms.Megha
Subject- Computers
Paper-Artificial Intelligence
Class- BCA-III

14 Nov, 2021	Sunday
3rd Week 15 Nov-20 Nov	**Artificial Intelligence, Intelligence, AI concepts, Various definitions of AI, Knowledge, Knowledge pyramid, people and Computers :What Computer scan do better than people, What people can do better than computers.**
Nov 19,2021 Nov 21,2021	Guru Nanak Dev Ji's Birthday Sunday
21 Nov, 2021	Sunday
4th Week 22 Nov-27	**Characteristics of AI problems, Problems Representation in AI ,Components of AI,AI evolution, Application of AI, History of AI, The Turing test, The Revised Turing Test.**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester

(November 2021 to February, 2022)

Name of the Teacher – Ms.Megha
Subject- Computers
Paper- Artificial Intelligence
Class- BCA-III

28 Nov, 2021	**Sunday**
Dec, 2021 **1st Week** **29 Nov-04 Dec**	**Expert system: Components of Expert System, Knowledge Base, Inference Engine, User Interface, Features of Expert System, ExpertSystem Life cycle.**
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	**Categories of Expert System, Rule Based vs Model Based Expert System.**
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	**Advantages and Limitations of Expert System, Developing an Expert System, Identification, conceptualization.**
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	**Formalization , Implementation, testing, using an expert system , Application area of expert systems.**
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
1st Week **27 Dec -01 Jan**	**AI and Search process: Brute Force Search-Depth/Breadth First Search, Heuristic Search: Hill Climbing ,Constraint Satisfaction.**
2 Jan ,2022	**Sunday**
Jan ,2022 **2nd week** **3 Jan – 8 Jan**	**Mean End Analysis, Best First Search, A*Algorithm, AO*Algorithm,Beam Search.**
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester

(November 2021 to February, 2022)

Name of the Teacher – Ms.Megha
Subject- Computers
Paper- Artificial Intelligence
Class- BCA-III

3rd week 10 Jan – 15 Jan	**Natural Language Processing: Introduction, need.**
16 Jan ,2022	**Sunday**
4th week 17 Jan – 22 Jan	**Goals of Natural Language Processing, Fundamental Problems in Natural Language Processing.**
23 Jan ,2022	**Sunday**
5th Week 24 Jan – 29 Jan	**Sessionals**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **1 Feb-4 Feb**	**How people overcome Natural Language Processing , Introduction of Speech Recognition, Advantages ,Approaches.**
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	**Introduction to Robotics, Parts of Robot, Controlling a Robot, Intelligent Robots, Mobile Robots.**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 19 Feb**	**Revision of all syllabus.**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester

(November 2021 to February, 2022)

Name of the Teacher – Ms.Megha
Subject- Computers
Paper- DBMS
Class- BCA II

3rdWeek **15 Nov-20 Nov**	**Basic Concepts- Data, Information, record and files, Traditional file based System, file based approach-limitations of File based Approach, database approach.**
Nov 19,2021 **Nov 21,2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
21 Nov, 2021	**Sunday**
4thWeek **22 Nov-27**	**Characteristics of database approach, DBMS, Components of DBMS environment, DBMS functions and Components, advantages and disadvantages of DBMS,**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester

(November2021 to February, 2022)

Name of the Teacher – Ms.Megha
Subject- Computers
Paper- DBMS
Class- BCA II

28 Nov, 2021	**Sunday**
Dec, 2021 **1**st **Week** **29 Nov-04 Dec**	**Roles in the database Environment, Data and database Administrator, database designers, application developers and users. database system architecture.**
05 Dec, 2021	**Sunday**
2nd **Week** **06 Dec -11 Dec**	**Three levels of Architecture, External, Conceptual and internal levels, schemas, mappings and instances, data Independence.** **Logical and physical Data Independence**
12 Dec,2021	**Sunday**
3rd **week** **13 Dec -18 Dec**	**Classifications of DBMS, centralized and client server architecture to DBMS. Data Models, Record based data models,**
19 Dec,2021	**Sunday**
4th **Week** **20 Dec-24 Dec**	**Object based data models, Physical data models, Data Models, and conceptual modelling**
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
1st **Week** **27 Dec -01 Jan**	**E-R models, entity types, Entity sets, Attributes, Relationship types, Relationship Instances .**
2 Jan ,2022	**Sunday**
Jan ,2022 **2**nd **week** **3 Jan – 8 Jan**	**E-R Diagrams ,Relational data models, brief history,**
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester

(November 2021 to February, 2022)

Name of the Teacher – Ms. Ms.Megha
Subject- Computers
Paper- DBMS
Class- BCA II

3rd week 10 Jan – 15 Jan	**Terminology in relational data structure, relations and properties of relations, keys, domains.**
16 Jan ,2022	**Sunday**
4th week 17 Jan – 22 Jan	**Integrity constraints over relations.**
23 Jan ,2022	**Sunday**
5th Week 24 Jan – 29 Jan	**Sessionals.**
26 Jan, 2022	**Republic Day**
30 Jan ,2022	**Sunday**
Feb, 2022 1st week 1 Feb-4 Feb	**Base tables and views.**
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week 7 Feb- 12 Feb	**Basic concept of hierarchical and network data models.**
13 Feb ,2022	**Sunday**
3rd week 14 Feb- 19 Feb	**Revision of all Syllabus.**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester

(November 2021 to February, 2022)

Name of the Teacher – Ms.Megha
Subject- Computers
Paper- Computer Fundamentals
Class- BBA-1

3rdWeek **15 Nov-20 Nov**	**Introduction to computers, Introduction, Component.**
Nov 19,2021 **Nov 21,2021**	**Guru Nanak Dev Ji's Birthday** **Sunday**
21 Nov, 2021	**Sunday**
4thWeek **22 Nov-27**	**Types and Brief History of Computers, Generation of Computers.**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester

(November 2021 to February, 2022)

Name of the Teacher – Ms.Megha
Subject- Computers
Paper- Computer Fundamentals
Class- BBA-1

28 Nov, 2021	**Sunday**
Dec, 2021 **1st Week** **29 Nov-04 Dec**	**Computer Memory, Software and Hardware.**
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	**Operating system, An Overview, Types, Functions, language.**
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	**Low, High level languages, language Processor, Assembler ,Compiler.**
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	**Interpreters, Networks-LAN, MAN,WAN.**
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
1st Week **27 Dec -01 Jan**	**Number System, CUI vs. GUI.**
2 Jan ,2022	**Sunday**
Jan ,2022 **2nd week** **3 Jan – 8 Jan**	**Windows-Features, Types.**
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester

(November2021 to February, 2022)

Name of the Teacher – Ms.Megha
Subject- Computers
Paper- Computer Fundamentals
Class- BBA-1

3rd week **10 Jan – 15 Jan**	**Introduction to Internet, Internet Basics.**
16 Jan ,2022	**Sunday**
4th week **17 Jan – 22 Jan**	**Benefits and limitations of Internet, Application and Scope.**
23 Jan ,2022	**Sunday**
5th Week **24 Jan – 29 Jan**	**Sessionals**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **1 Feb-4 Feb**	**IP Address, Browser.**
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	**WWW, E-Mail, Video –Conferencing.**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 19 Feb**	**Revision of all syllabus**

KVA DAV College for Women, Karnal
Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Nidhi
Class-M.Sc. 1st Sem
Subject- Web Engineering

3rd Week **16 Nov-20 Nov**	Introduction to Web Engineering: Categories and Characteristics of Web Applications
21 Nov, 2021	**Sunday**
4th Week **22 Nov-27**	Web Applications Vs Conventional Software, Need for an Engineering Approach, Web Essentials: The Internet, Basic Internet Protocols, WWW, HTTP (Structure of Request and Response Messages)
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov-04 Dec**	Web Browser and its functions, URL, Web Servers and their features Defining Virtual Hosts, Secure Servers
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	MarkUp Languages: Introduction to HTML, Characteristics, XHTML Syntax and Semantics
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	Fundamental HTML Elements, Lists, Tables, Frames, Forms, XHTML Abstract Syntax, Creating HTML Pages
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	Cascading Style Sheets: Features, Core Syntax, Types, Style Sheets and HTML, Style Rule Cascading and Inheritance, Text Properties
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	CSS Box Model, Normal Flow Box Layout, Positioning and other useful Style Properties
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	Client–Side Programming: Introduction to JavaScript, Perspective, Basic Syntax, Variables and Data types
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 15 Jan**	JavaScript Statements, Operators, Literals, Functions, Objects, Arrays,Built-in Objects, Debuggers, Server-Side Programming: ServletArchitecture, Generating Dynamic Content, Servlet Life Cycle
16 Jan ,2022	**Sunday**
3rd week **17 Jan – 22 Jan**	Sessions, Cookies, URL Rewriting, Servlet Capabilities, Servlets and Concurrency, XML: Relation between XML, HTML, SGML, Goals ofXML, Structure and Syntax of XML, Well Formed XML
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan, 31 Jan**	**Sessional Exam**
26 Jan, 2022 **30 Jan ,2022**	**Republic DaySunday**
1st week **1 Feb-4 Feb**	DTD and its Structure, Namespaces and Data Typing in XML, XPATH, Template based Transformations,
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Linking with XML, Displaying XML documents in Browsers
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 19 Feb**	Revision of the syllabus Problems taken from students

KVA DAV College for Women, Karnal
Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Nidhi

Class-BCA 1st Sem

Subject- Programming in C

3rd Week **16 Nov-20 Nov**	History of C, Importance of C, Structure of a C Program.
21 Nov, 2021	**Sunday**
4th Week **22 Nov-27**	C character set, identifiers and keywords, Data types, Constants and Variables, Assignment statement, Symbolic constant.
28 Nov, 2021	**Sunday**
Dec, 2021 **1st Week** **29 Nov-04 Dec**	Input/output: Unformatted & formatted I/O function in C, Input functions scanf(), getch(), getche(), getchar(), gets()), Output functions printf(), putch(), putchar(), puts() .
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Operators & Expression: Arithmetic, relational, logical, bitwise, unary, assignment, conditional operators and special operators.
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	Operators & Expression: Arithmetic, relational, logical, bitwise, unary, assignment, conditional operators and special operators. & Group Discussion.
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	Decision making & branching: Decision making with IF statement, IF-ELSE state ment, Nested IF statement, ELSE -IF ladder, switchstatement, goto statement.
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	Decision making & looping: While and do-while loop
2 Jan ,2022	**Sunday**
Jan ,2022 **1st week** **3 Jan – 8 Jan**	Looping: For, jumps in loops, break, continue statement.
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 15 Jan**	Functions: Definition, prototype, Passing parameters to functions,Recursion & its uses
16 Jan ,2022	**Sunday**
3rd week **17 Jan – 22 Jan**	Revisions ,Discussions & Tests
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan,** **31 Jan**	**Sessional Exam**
26 Jan, 2022 **30 Jan ,2022**	**Republic DaySunday**
1st week **1 Feb-4 Feb**	Storage classes in C: auto, extern, register and static storage class, their scope, storage, & lifetime.
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Arrays: Definition, types, initialization, processing an array, passingarrays to functions,
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 19 Feb**	Strings and its inbuilt functions, and how to use string as parametersand use with pointers.

KVA DAV College for Women, Karnal Lesson plan for the odd semester (October, 2021 to February, 2022)

Name of the Teacher – Ms. Nidhi

Class-BCA 5th Sem

Subject- Multimedia Tools

3rdWeek **16 Nov-20 Nov**	Multimedia: Basic Concept, Definition, Components & Applications of Multimedia;
21 Nov, 2021	<center>**Sunday**</center>
4thWeek **22 Nov-27**	Hypermedia and Multimedia, Multimedia Hardware and Software; Multimedia Software Tools;
28 Nov, 2021	<center>**Sunday**</center>
Dec, 2021 1st Week **29 Nov-04 Dec**	Presentation Tools,Multimedia Authoring: Introduction, Features, Types of Authoring Tools: Card or Page-Based,
05 Dec, 2021	<center>**Sunday**</center>
2nd Week **06 Dec -11 Dec**	Icon-Based, Time-Based, Object-Oriented; VRML: History, Features
12 Dec,2021	<center>**Sunday**</center>
3rd week **13 Dec -18 Dec**	Images: Graphics/Image Data Types, File Formats; Color Models in Images and Video;
19 Dec,2021	<center>**Sunday**</center>
4th Week **20 Dec-24 Dec**	Video: Introduction, Types of Video Signals; Analog and Digital Video; Analog Video Standards:
25 Dec,2021 **26 Dec,2021**	<center>**Christmas** **Sunday**</center>
5th Week **27 Dec -01 Jan**	NTSC, PAL, SECA; Digital Video Standards: Chroma Subsampling, CCIR Standards, HDTV
2 Jan ,2022	<center>**Sunday**</center>
Jan ,2022 1st week **3 Jan – 8 Jan**	Digital Audio: Basic Concepts, Analog vs. Digital Audio, Digitization ofSound; Digital Audio File Formats, MIDI
9 Jan ,2022	<center>**Sunday (Sh. Guru Gobind Singh's Birthday)**</center>
2nd week **10 Jan – 15 Jan**	Quantization and Transmission of Audio: Coding of Audio; Pulse Code Modulation; Differential
16 Jan ,2022	<center>**Sunday**</center>
3rd week **17 Jan – 22 Jan**	Coding of Audio; Lossless Predictive Coding; DPCM; DM; ADPCM, Compression Techniques: Introduction, Types of Data Compression,
23 Jan ,2022	<center>**Sunday**</center>
4th Week **24 Jan – 29 Jan,** **31 Jan**	<center>**Sessional Exam**</center>
26 Jan, 2022 **30 Jan ,2022**	<center>**Republic DaySunday**</center>
Feb, 2021 1st week **1 Feb-4 Feb**	Run-Length Coding, Variable-Length Coding, Dictionary-Based Coding, Transform Coding
5 Feb, 2022 **6 Feb ,2022**	<center>**Vasant Panchmi** **Sunday**</center>
2nd week **7 Feb- 12 Feb**	Image and Video Compression Techniques: JPEG Standard for Image, Compression; JPEG Mode,
13 Feb ,2022	<center>**Sunday**</center>
3rd week **14 Feb- 19 Feb**	Video Compression Techniques: H.261, H.263, MPEG, Revision of Syllabus and Class Tests

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet kaur
Subject- Advanced Operating System
Paper- MS-15-34
Class- M.Sc. III Sem

October, 2021 2nd Week **11 Oct-16 Oct**	**Introduction to Distributed Systems**, Hard ware concepts, Software concepts, Design issues
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
3rd Week **18 Oct-23 Oct**	Communication in Distributed Systems, Lay red Protocols, ATM networks, Remote Procedure call
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
May, 2021 4th Week **25 Oct-30 Oct**	The Client – server model, Group communication. **Synchronization in Distributed System**, Clock Synchronization
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	Mutual Exclusion, Election algorithms, Atomic transactions, Deadlocks in Distributed Systems.
14 Nov, 2021	**Sunday**
3rdWeek **15 Nov-20 Nov**	**Process and processors in Distributed System** Threads, System Models, Processors allocation.
19 Nov,2021 **21 Nov, 2021**	**Sh. Guru Nanak Jayanti** **Sunday**
4thWeek **22 Nov-27**	**Scheduling** in Distributed System, Fault tolerance, Distributed File Systems, **Assignment-1**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet Kaur
Subject- Advanced Operating System
Paper- MS-15-34
Class- M.Sc. III Sem

28 Nov, 2021	**Sunday**
Dec, 2021 **1st Week** **29 Nov-04 Dec**	**Revision and Test**
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Distributed File System Design Distributed File System implementation, Trends in Distributed File System.
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	**Distributed Shared Memory**: Introduction, Consistency models **Page based** Distributed Shared memory. **Assignment-2**
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	**Shared** – variable Distributed Shared memory, **Object based** Distributed Shared Memory.
25 Dec,2021	**Christmas**
26 Dec,2021	**Sunday**
5th Week **27 Dec -01 Jan**	**REAL TIME AND MOBILE OPERATING SYSTEMS** : Basic Model of Real Time Systems, Characteristics, Applications of Real Time Systems,
2 Jan ,2022	**Sunday**
Jan ,2022 **1st week** **3 Jan – 8 Jan**	**Revision and Test**
9 Jan ,2022	**Sunday**
2nd Week **10 Jan – 15 Jan**	**Real Time Task Scheduling**, Scheduling Algorithms, Handling Resource Sharing,
16 Jan ,2022	**Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet Kaur
Subject- Advanced Operating System
Paper- MS-15-34
Class- M.Sc. III Sem

3rd week **17 Jan – 22 Jan**	**Mobile Operating Systems**, Memory Management in Mobile Operating System
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 28 Jan** **29 Jan**	**Problems** **Sessional**
30 Jan ,2022	**Sunday**
Feb, 2022 1st week **1 Feb-4 Feb**	Micro Kernel Design, Client Server Resource Access.
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	**Processes and Threads : Introduction, management, PCB,TCB** **Seminar**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 18 Feb**	**Revision of Important Topics**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet Kaur
Subject- Computer Applications in Business
Paper- MC 301
Class- M.Com III Sem

October, 2021 2nd Week **11 Oct-16 Oct**	**Computer System**: Meaning, scope, types; Basic computer organization: Central Processing Unit
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
3rd Week **18 Oct-23 Oct**	**Input/ output and storage devices**
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
4th Week **25 Oct-30 Oct**	**Introduction to software:** System software - operating system, user interface and its types
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	**Application software -** word processing, Features, Advantages, Disadvantages, Application
14 Nov, 2021	**Sunday**
3rdWeek **15 Nov-20 Nov**	**Application software :**spreadsheets, Features, Advantages, Disadvantages, Application
19 Nov,2021 **21 Nov, 2021**	**Sh. Guru Nanak Jayanti** **Sunday**
4thWeek **22 Nov-27**	**Revision And Class Test** **Assignment-1**
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov-04 Dec**	**Introduction to databases**, tables, queries, reports and form generation.
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	**Revision of Topics**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet Kaur
Subject- Computer Applications in Business
Paper- MC 301
Class- M.Com III Sem

12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	**Information Technology in Business**: Introduction, Concept of information technology, Uses, Need of IT. **Assignment-2**
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	**Networking**: Local Area Network–media & topologies and Wide Area Networks- media & topologies
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	**Revision and Class Test**
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	**Internet**: Intranet and extranet, concept and evolution;
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 15 Jan**	**Fuzzy Logic:** Introduction, Fuzzy set, Crisp set, fuzzy logic, Applications
16 Jan ,2022	**Sunday**
3rd week **17 Jan – 22 Jan**	**Revision of the above Topics And problems**
23 Jan ,2022	**Sunday**
4th Week **24 Jan** **25 Jan– 29 Jan**	**Sessional** World Wide Web, Multimedia technologies; Video conferencing;
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **31 Jan - 4 Feb**	**Electronic data processing:** Introduction, Methods, Applications, Advantages, Disadvantages.

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet Kaur
Subject- Computer Application in Business
Paper- MC 301
Class- M.Com III Sem

5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Broadband networks; Planning and designing web pages.
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 19 Feb**	**Revision of Important Topics**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet kaur
Subject- Web Technology
Paper- BC (Voc)-505
Class- BC (Voc) - V Sem

October, 2021 2nd Week **11 Oct-13 Oct**	**Internet basic** , **Introduction to HTML-** tags- list - creating table
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
3rd Week **18 Oct-21 Oct**	**Linking**: Document frames , graphics to HTML doc, Hyperlinks
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
4th Week **25 Oct-27 Oct**	**Style sheet** - style sheet basic - add style to document - creating style sheet rules
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-10 Nov**	**Style sheet properties** – Font, Text, list - color and background color
14 Nov, 2021	**Sunday**
3rdWeek **15 Nov-17 Nov**	**Box** - display properties, Links
19 Nov, 2021 **21 Nov, 2021**	**Sh. Guru Nanak Jayanti** **Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet kaur
Subject- Web Technology
Paper- BC (Voc)-505
Class- BC (Voc) - V Sem

4thWeek **22 Nov-24**	**Revision And Class Test** **Assignment-1**
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov-1 Dec**	**Introduction to Java Script** - advantage of Java Script - JavaScript syntax - data types
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -08 Dec**	**Java Script** : variable , operator and expression
12 Dec,2021	**Sunday**
3rd week **13 Dec -15 Dec**	**Java script** -array looping constructor **Assignment-2**
19 Dec,2021	**Sunday**
4th Week **20 Dec-22Dec**	**Functions** – dialog box, Constructors
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -29 Dec**	**Event handling – E**vent handling using java script Object in HTML - build in object
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 5 Jan**	**Java Script document object model** – user defined object
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 12 Jan**	form object, navigator object
16 Jan ,2022	**Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet kaur
Subject- Web Technology
Paper- BC (Voc)-505
Class- BC (Voc) - V Sem

3rd week **17 Jan – 19 Jan**	**Window object,** document object, browser object **Revision and Problems**
23 Jan ,2022	**Sunday**
4th Week **24 Jan** **25 Jan**	**Revision** **Sessional**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **31 Jan-2 Feb**	Screen object, cookies.
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 9 Feb**	**Revision of all Topics**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Topics**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet kaur
Subject-Fundamentals of E- Commerce
Paper- BBA-304
Class- BBA V Sem

October, 2021 2nd Week **11 Oct-16 Oct**	**Overview of e-commerce:-** Definition, benefits of e-commerce, role of internet in e-commerce, Applications
15 Oct, 2021 **17 Oct, 2021**	**(Dussehra)** **Sunday**
3rd Week **18 Oct-23 Oct**	Implications of e-commerce for accounting professionals. Regulatory environment:- cryptography issues
20 Oct, 2021 **24 Oct, 2021**	**Maharishi Valmiki Jayanti** **Sunday**
4th Week **25 Oct-30 Oct**	**privacy issues** (children's issues, adults rights), domain name disputes, electronic agreements & digital signatures
31 Oct, 2021	**Sunday**
November, 2021 1st Week **1 Nov-7 Nov**	**(Haryana Day)** **Diwali Holidays**
2nd Week **8 Nov-13 Nov**	Internet service provider, firewalls, components of firewall
14 Nov, 2021	**Sunday**
3rd Week **15 Nov-20 Nov**	limitations of the security preventions provide By firewalls, OSI Model
19 Nov, **21 Nov, 2021**	**Sh. Guru Nanak Jayanti** **Sunday**
4th Week **22 Nov-27**	TCP/IP **Assignment-1**
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov-04 Dec**	**Revision and Test**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet kaur
Subject- Fundamentals of E- Commerce
Paper- BBA-304
Class- BBA V Sem

05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	**Revision and Problems**
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	**EDI e-commerce & internet:- traditional EDI systems(origin, non EDI systems), value added networks.** **Assignment-2**
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	**partially & fully integrated EDI** systems, benefits of EDI systems
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	**Financial EDI & EDI systems & internet.**
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	**Revision and Test**
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 15 Jan**	Intelligent agents, web based marketing
16 Jan ,2022	**Sunday**
3rd week **17 Jan – 22 Jan**	**Revision of topics and Problems**
23 Jan ,2022	**Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms. Ravneet kaur
Subject- Fundamentals of E- Commerce
Paper- BBA-304
Class- BBA V Sem

4th Week **24 Jan** **25 Jan – 29 Jan**	**Sessional** **Risk management:** Introduction , Risk management paradigm
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **1 Feb-4 Feb**	**Risk management**: Role of internet, Controls in risk management
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	**Revision of Full syllabus**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of Full syllabus and Problems**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper- Paper-I
Subject- Computer and Programming Fundamentals
Class- B.A-I (CS)

3rdWeek 15 Nov-17 Nov	**Computer Fundamentals: Definition, Functional Components of Computer Characteristics & Classification of Computers,**
19 Nov,2021 21 Nov, 2021	**Guru Nanak Jayanti Sunday**
4thWeek 22 Nov-24 Nov	**Applications of Computers in various Fields. Memory: Types of ROM, Cache memory, CPU Registers**
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week 29 Nov-01 Dec	**Sequential & direct access devices,**
05 Dec, 2021	**Sunday**
2nd Week 06 Dec -8 Dec	**Magnetic tape, CD, DVD. Class test of Unit-I**
12 Dec,2021	**Sunday**
3rd week 13 Dec -15 Dec	**Computer I/O devices, Overview of Operating System: Definition, Functions of Operating system**
19 Dec,2021	**Sunday**
4th Week 20 Dec-22 Dec	**Concept of multiprogramming, multitasking, multithreading, multiprocessing, time sharing, real time.**
25 Dec,2021 26 Dec,2021	**Christmas Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper- Paper-I
Subject- Computer and Programming Fundamentals
Class- B.A-I (CS)

5th Week **27 Dec -29 Dec**	**Planning the computer program: Concepts of problem solving, Problem definition**
2 Jan ,2022	**Sunday**
Jan ,2022 1st week 3 Jan – 5 Jan	**Program design, debugging, types of errors in programming, documentation. Techniques of problem solving: Flowcharting, algorithms**
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 12 Jan**	**Programming methodologies top-down and bottom up programming. Searching, linear & Binary Searching.**
16 Jan ,2022	**Sunday**
3rd week **17 Jan – 19 Jan**	**Sorting: Bubble selection, and insertion sorting, Merging.**
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 25 Jan**	**Revision of Important Topics**
29 Jan	**Sessional**
26 Jan, 2022 30 Jan ,2022	**Republic Day Sunday**
Feb, 2022 1st week 31 Jan-2 Feb	**Computer languages: machine language assembly language, high level language.**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Subject- Computer and Programming Fundamentals
Paper- Paper-I
Class- B.A-I (CS)

5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 9 Feb**	**Revision of Important Topics**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of Syllabus and Class Tests**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper- Paper-II
Subject- PC Software
Class- B.A-I (CS)

3rdWeek **18 Nov-20 Nov**	**Windows: Basics, components of windows**
19 Nov,2021 **21 Nov, 2021**	**Guru Nanak Jayanti** **Sunday**
4thWeek **25 Nov-27 Nov**	**Configuring system devices. Control panel, using windows accessories.**
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **2 Dec-4 Dec**	**Documentation using word- introduction to office automation, creating & editing document, formatting document, auto-text, autocorrect, spelling and grammar tool**
05 Dec, 2021	**Sunday**
2nd Week **09 Dec -11 Dec**	**Document dictionary, page formatting, bookmark** **Advance features of MS-Word-Mail Merge, Macros, Tables**
12 Dec,2021	**Sunday**
3rd week **16 Dec -18 Dec**	**File Management, Printing , styles, Linking and embedding object**
19 Dec,2021	**Sunday**
4th Week **23 Dec-24 Dec**	**Revision of the above Topics**
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper- Paper-II
Subject- PC Software
Class- B.A-I (CS)

5th Week **30 Dec -01 Jan**	**Electronic Spread Sheet using Excel- Introduction to MS-Excel, creating & Editing worksheet**
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **6 Jan – 8 Jan**	**Formatting and essential, Operations, formulas and functions, charts**
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **13 Jan – 15 Jan**	**Advance features of MS-excel-pivot table & pivot chart,**
16 Jan ,2022	**Sunday**
3rd week **20 Jan – 22 Jan**	**Linking and consolidation, database Magement using excel-sorting, filtering, table, validation, Goal Seek, Scenario.**
23 Jan ,2022	**Sunday**
4th Week **27 Jan – 29 Jan**	**Presentation using PowerPoint: presentations, creating, Manipulating & Enhancing Slides**
25 Jan,2022	**Sessional**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **3 Feb - 5 Feb**	**Discuss of important topics for Exam**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper- Paper-II
Subject- PC Software
Class- B.A-I (CS)

5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **10 Feb- 12 Feb**	**Organizational Charts, Excel Charts, Word Art, Layering art objects, Object, inserting recorded sound effect or in built sound effect.**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of important Topics**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper Code-BBA-205
Subject- Fundamentals of DBMS and ORACLE
Class- BBA-3rd Sem

3rdWeek 18 Nov-20 Nov	**Basic Concepts** **Traditional file oriented approach: Advantages Disadvantages,**
19 Nov,2021 **21 Nov, 2021**	**Guru Nanak Jayanti** **Sunday**
4thWeek 25 Nov-27 Nov	**Advantages of Database approach, Components of DBMS** **Advantages and Disadvantages of DBMS**
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week 2 Dec -04 Dec	**DBMS Architecture**
05 Dec, 2021	**Sunday**
2nd Week 09 Dec -11 Dec	**Data Independence, Data Models, Keys.** **Computers: An introduction, use of computer in business, advantages and disadvantages**
12 Dec,2021	**Sunday**
3rd week 16 Dec -18 Dec	**computerized system for inventory control, payroll order, banking and accounting**
19 Dec,2021	**Sunday**
4th Week 23 Dec-24 Dec	**Revision and Class Test**
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper Code-BBA-205
Subject- Fundamentals of DBMS and ORACLE
Class- BBA-3rd Sem

5th Week 30 Dec -01 Jan	**SQL using ORACLE: Introduction to SQL, Components of SQL: DDL, DML & DCL**
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **6 Jan – 8 Jan**	**Data types in SQL, DDL Commands: Create, Alter, Drop, and Truncate. Creating queries with DDL commands and implementing constraints.**
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **13 Jan – 15 Jan**	**DML Commands: Insert, Delete, Update, Select, Select with Group by and Order by. Creating queries with DML commands**
16 Jan ,2022	**Sunday**
3rd week **20 Jan – 22 Jan**	**Revision of above Topics and Class Test**
23 Jan ,2022	**Sunday**
4th Week **27 Jan – 29 Jan**	**Operators: Set and Logical, SQL functions: Numeric functions, Scalar functions and Group functions**
25 Jan,2022	**Sessional**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 1st week **3 Feb -5 Feb**	**Revision of important Topics**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper Code-BBA-205
Subject- Fundamentals of DBMS and ORACLE
Class- BBA-3rd Sem

5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **10 Feb- 12 Feb**	**Report-Writing: Commands, advantages of Report writing.**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of important Topics**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper- Paper-II
Subject- Fundamentals of Database Systems
Class- B.A-5th Sem (CS)

3rdWeek 15 Nov-20 Nov	**Basic Concepts – Data, Information, Records and files. Traditional file Based Approach-** **Limitations of Traditional File Based Approach, Database Approach-Characteristics of Database**
19 Nov,2021 21 Nov, 2021	**Guru Nanak Jayanti** **Sunday**
4thWeek 22 Nov-27	**Database Management System (DBMS), Advantages and Disadvantages , Components of DBMS .**
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week 29 Nov-04 Dec	**Actors on the Scene - Data and Database Administrator, Database Designers, End users** **Applications Developers and Workers behind the Scene.**
05 Dec, 2021	**Sunday**
2nd Week 06 Dec -11 Dec	**Database System Architecture – Three Levels of Architecture, Schemas – External, Conceptual and Internal Level**
12 Dec,2021	**Sunday**
3rd week 13 Dec -18 Dec	**Revision of important topics** **Class Test**
19 Dec,2021	**Sunday**
4th Week 20 Dec-24 Dec	**Data Independence – Logical and Physical Data Independence**
25 Dec,2021 26 Dec,2021	**Christmas** **Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper- Paper-II
Subject- Fundamentals of Database Systems
Class- B.A-5th Sem (CS)

5th Week 27 Dec -01 Jan	**Data Models: High Level, Low Level and Representational – Records-based Data Models**
2 Jan ,2022	**Sunday**
Jan ,2022 1st week 3 Jan – 8 Jan	**Object-based Data Models, Physical Data Models and Conceptual Models**
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week 10 Jan – 15 Jan	**Entity-Relationship Model – Concepts, Entity Types, Entity Sets, Attributes, Relationships**
16 Jan ,2022	**Sunday**
3rd week 17 Jan – 22 Jan	**ER Diagrams of any Database Organization- Inventory System, Payroll System, Reservation System, Online Book Store etc.**
23 Jan ,2022	**Sunday**
4th Week 24 Jan – 29 Jan	**Revision and Problems**
27 Jan,2022	**Sessional**
26 Jan, 2022 30 Jan ,2022	**Republic Day Sunday**
Feb, 2022 1st week 31 Jan-4 Feb	**Relational Data Model:-Brief History, Terminology in Relational Data Structure**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper- Paper-II
Subject- Fundamentals of Database Systems
Class- B.A-5ᵗʰ Sem (CS)

5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2ⁿᵈ week **7 Feb- 12 Feb**	**Revision of Syllabus and Class Tests**
13 Feb ,2022	**Sunday**
3ʳᵈ week **14 Feb- 19 Feb**	**Revision of all Topics**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper Code- BC-104
Subject- Computer Applications in Business
Class- B.Com 1ˢᵗ Sem (General)

3ʳᵈWeek 15 Nov-17 Nov	**Introduction to Computers: definition, components**
19 Nov,2021 21 Nov, 2021	**Guru Nanak Jayanti** **Sunday**
4ᵗʰWeek 22 Nov-24 Nov	**Characteristics of computers**
28 Nov, 2021	**Sunday**
Dec, 2021 1ˢᵗ Week 29 Nov-1 Dec	**Input and output Devices**
05 Dec, 2021	**Sunday**
2ⁿᵈ Week 06 Dec -8 Dec	**Memory and mass storage devices; Introduction to modern CPU and processors.**
12 Dec,2021	**Sunday**
3ʳᵈ week 13 Dec -15 Dec	**Computer software: introduction, types of software: system, application and utility software**
19 Dec,2021	**Sunday**
4ᵗʰ Week 20 Dec-22 Dec	**Introduction to operating system: types and function of operating system**
25 Dec,2021 26 Dec,2021	**Christmas** **Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper Code- BC-104
Subject- Computer Applications in Business
Class- B.Com 1st Sem (General)

5th Week **27 Dec -29 Jan**	**Real-time applications: Operating systems for Tabs, mobile phones, Android, etc.**
2 Jan ,2022	**Sunday**
Jan ,2022 **1st week** **3 Jan – 5 Jan**	**Open source software: An overview** **Application software: Spreadsheets**
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 12 Jan**	**Word processors**
16 Jan ,2022	**Sunday**
3rd week **17 Jan – 19 Jan**	**Database Management software**
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 25 Jan**	**Revision and Problems**
29 jan-2022	**Sessional**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2022 **1st week** **31 Jan-2 Feb**	**Networks basic, types of networks, topologies, media**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper Code- BC-104
Subject- Computer Applications in Business
Class- B.Com 1st Sem (General)

5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 9 Feb**	**Discuss important topics for Exam**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Topics**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper Code- BC-104
Subject- Computer Applications in Business
Class- B.Com 1ˢᵗ Sem (ASPSM)

3ʳᵈWeek 18 Nov-20 Nov	**Introduction to Computers: definition, components**
19 Nov,2021 21 Nov, 2021	**Guru Nanak Jayanti** **Sunday**
4ᵗʰWeek 25 Nov-27	**Characteristics of computers**
28 Nov, 2021	**Sunday**
Dec, 2021 1ˢᵗ Week 2 Dec-4 Dec	**Input and output Devices**
05 Dec, 2021	**Sunday**
2ⁿᵈ Week 9 Dec -11 Dec	**Memory and mass storage devices; Introduction to modern CPU and processors.**
12 Dec,2021	**Sunday**
3ʳᵈ week 16 Dec -18 Dec	**Computer software: introduction, types of software: system, application and utility software**
19 Dec,2021	**Sunday**
4ᵗʰ Week 23 Dec-25 Dec	**Introduction to operating system: types and function of operating system**
25 Dec,2021 26 Dec,2021	**Christmas** **Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper Code- BC-104
Subject- Computer Applications in Business
Class- B.Com 1st Sem (ASPSM)

5th Week 30 Dec -01 Jan	**Real-time applications: Operating systems for Tabs, mobile phones, Android, etc.**
2 Jan ,2022	**Sunday**
Jan ,2022 1st week 6 Jan – 8 Jan	**Open source software: An overview Application software: Spreadsheets**
9 Jan ,2022	**Sunday (Sh. Guru Gobind Singh's Birthday)**
2nd week **13 Jan – 15 Jan**	**Word processors**
16 Jan ,2022	**Sunday**
3rd week **20 Jan – 22 Jan**	**Database Management software**
23 Jan ,2022	**Sunday**
4th Week **27 Jan – 29 Jan**	**Revision and Problems**
27 jan-2022	**Sessional**
26 Jan, 2022 30 Jan ,2022	**Republic Day Sunday**
Feb, 2022 1st week 3 Feb- 5 Feb	**Networks basic, types of networks, topologies, media**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(October, 2021 to February, 2022)

Name of the Teacher – Ms.Gurcharan Kaur
Paper Code- BC-104
Subject- Computer Applications in Business
Class- B.Com 1st Sem (ASPSM)

5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **10 Feb- 12 Feb**	**Discuss important topics for Exam**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Topics**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(November, 2021 to February, 2022)

Name of the Teacher – Ms. Leena
Subject- Computers
Paper- Computer Networks (BCA-354)
Class- BCA-III

3rdWeek **16 Nov-20 Nov**	Network Design issues and protocols, Connection-Oriented and Connectionless Services, OSI Reference Model, Networking Models Distributed Systems etc.
19 Nov, 2021	**Sunday**
21 Nov, 2021	**Guru Nanak Dev Ji's Birthday**
4thWeek **22 Nov-27 Nov**	Client/Server Model, Peer-to-Peer Model, Web Based Model and Emerging File-Sharing Model, Analog and Digital data Signals.
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov -04 Dec**	Bandwidth and Data Rate, Capacity, Baud Rate, Transmission Impairment, Data Rate Limits, Guided Transmission Media, Wireless Transmission.
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Using Communication Satellites, Switching and Multiplexing, Modulation Techniques, ADSL and Cable Modems.
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	Data Link Layer Design issues, Error Detection and Correction, Sliding Window Protocols, One-bit, Go Back N and Selective Repeat.
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	Media Access Control, ALOHA, Slotted ALOHA, CSMA.
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec-01 Jan**	Collision free protocols.
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	Gigabit Ethernet, Token Ring, Introduction to Wireless LANs and Bluetooth, VLANs.
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 15 Jan**	Routing Algorithms, Flooding, Shortest Path Routing, Distance Vector Routing, Link State Routing.
16 Jan ,2022	**Sunday**
3rdweek **17 Jan – 22 Jan**	Hierarchical Routing, Congestion Control, Traffic Shaping, Choke Packets,

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(November, 2021 to February, 2022)

Name of the Teacher – Ms. Leena
Subject- Computers
Paper- Computer Networks (BCA-354)
Class- BCA-III

23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan**	**Sessionals Exam**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2021 1st week **31 Jan -4 Feb**	Load Shedding, Elements of Transport protocols, Network Security.
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Security Issues, Security Attacks, Encryption methods, Digital Signature, Digital Certificate.
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	Revision of all Syllabus

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(November, 2021 to February, 2022)

Name of the Teacher – Ms. Leena
Subject- Computers
Paper- Visual Basic (BCA-355)
Class- BCA III

3rdWeek **16 Nov-20 Nov**	Menu bar, Toolbar, Project explorer, Tollbox, Properties Window.
19 Nov, 2021	**Guru Nanak Dev Ji's Birthday**
21 Nov, 2021	**Sunday**
4thWeek **22 Nov-27 Nov**	Form Designer, Form Layout, Immediate Window.
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov -04 Dec**	Basics of Programming, Default Controls in Tool Box Visual Development and Event Driven Programming.
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Converting Variables Types, Variables, Declaring Variables, Types of Variables.
12 Dec,2021	**Sunday**
3rd week **13 Dec -18 Dec**	Constants Named & Intrinsic, User Defined Data Types, Forcing Variable Declaration, Scope and Lifetime Variables.
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	If Statement, Arithmetic, Relational & Logical Operators, Input/Output in VB, Various Controls for I/O, Message box, Input Box, Print statement.
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec -01 Jan**	Exit statement, If-then-else Statement, select-case, Looping Statements in VB, do-loop, for-next, while-wend.
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	Nested Control Structure, Arrays, Declaring and using arrays, One-dimensional, Two-Dimensional and Multi-Dimensional Arrays.
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**
2nd week **11 Jan – 15 Jan**	Static and Dynamic arrays, Arrays of Arrays.
16 Jan ,2022	**Sunday**
3rdweek **17 Jan – 22 Jan**	General & Event Procedures, Subroutines, Functions**.**
23 Jan ,2022	**Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(November, 2021 to February, 2022)

Name of the Teacher – Ms. Leena
Subject- Computers
Paper- Visual Basic (BCA-355)
Class- BCA III

4th Week **24 Jan – 29 Jan**	**Sessionals**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2021 **1st week** **31 Jan -4 Feb**	Calling Procedures, Arguments-Passing Mechanisms, Optional Arguments**.**
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 12 Feb**	Functions Returning, Custom Data Types.
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Syllabus**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(November, 2021 to February, 2022)

Name of the Teacher – Ms. Leena
Subject- Computers
Paper-I Computer and Programming Fundamentals (BCA-111)
Class- BCA I

3ʳᵈWeek **16 Nov-17Nov**	Concept of Primary & Secondary Memory, RAM, ROM Types of ROM, Flash Memory.
19 Nov, 2021	**Guru Nanak Dev Ji's Birthday**
21 Nov, 2021	**Sunday**
4ᵗʰWeek **22 Nov-24 Nov**	Secondary Storage device , Sequential & direct acess devices, Magnetic tape.
28 Nov, 2021	**Sunday**
Dec, 2021 1ˢᵗ Week **29 Nov -04 Dec**	Magnetic disk, CD, DVD, I/O devices, Relationship between hardware and software, Types of Software, Operating System
05 Dec, 2021	**Sunday**
2ⁿᵈ Week **06 Dec -8 Dec**	Functions of Operating system, Concept of multiprogramming, multitasking, multithreading, multiprocessing, time-sharing.
12 Dec,2021	**Sunday**
3ʳᵈ week **13 Dec -15 Dec**	Real time, single-user & multi-user operating system, concept of problem solving, Problem definition, program design, Debugging.
19 Dec,2021	**Sunday**
4ᵗʰ Week **20 Dec-22 Dec**	Types of errors in programming, Documentation, Techniques of Problem solving, Flowchart, algorithms.
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5ᵗʰ Week **27 Dec -01 Jan**	Pseudo code, decision table, Structured programming Concepts
2 Jan ,2022	**Sunday**
Jan ,2022 1ˢᵗ week **3 Jan – 8 Jan**	Programming methodologies, top-down and bottom-up programming, Computer Virus, WORMS, Trojan.
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**
2ⁿᵈ week **11 Jan – 12 Jan**	Linear & Binary Searching, Bubble, Selection, and Insertion Sorting.
16 Jan ,2022	**Sunday**
3ʳᵈweek **17 Jan – 19 Jan**	Merging, Design of algorithms for Searching, Sorting and merging.
23 Jan ,2022	**Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(November, 2021 to February, 2022)

Name of the Teacher – Ms. Leena
Subject- Computers
Paper-I Computer and Programming Fundamentals (BCA-111)
Class- BCA I

4th Week 24 Jan – 29 Jan	**Sessionals**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2021 **1st week** **31 Jan ,1-2 Feb**	Analogy with natural Language, machine language, assembly language, high-level Language.
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **7 Feb- 9 Feb**	Language translators, Characteristics of a good programming language.
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Syllabus**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(November, 2021 to February, 2022)

Name of the Teacher – Ms. Leena
Subject- Computers
Paper-I Logical Organization of Computers
Class- BCA I

3rdWeek **16 Nov-20 Nov**	Error detecting and correcting codes, Character Representation – ASCII, EBCDIC
19 Nov, 2021	**Guru Nanak Dev Ji's Birthday**
21 Nov, 2021	**Sunday**
4thWeek **25 Nov-27 Nov**	Boolean Algebra, Boolean Theorems, Boolean Functions and Truth Tables.
28 Nov, 2021	**Sunday**
Dec, 2021 1st Week **29 Nov -04 Dec**	Canonical and Standard forms of Boolean functions.
05 Dec, 2021	**Sunday**
2nd Week **06 Dec -11 Dec**	Simplification of Boolean functions
12 Dec,2021	**Sunday**
3rd week **13Dec -18 Dec**	Venn Diagram, Karnaugh Maps.
19 Dec,2021	**Sunday**
4th Week **20 Dec-24 Dec**	Logic Basic Gates- AND, OR, NOT
25 Dec,2021 **26 Dec,2021**	**Christmas** **Sunday**
5th Week **27 Dec-31 Dec,1 Jan**	Universal Gates- NAND, NOR, Other Gates- XOR, XNOR etc.
2 Jan ,2022	**Sunday**
Jan ,2022 1st week **3 Jan – 8 Jan**	Implementations of digital circuits, Combinational Logic
9 Jan ,2022	**Sunday(Sh. Guru Gobind Singh's Birthday)**
2nd week **10 Jan – 15 Jan**	Characteristics, Design Procedures, analysis procedures.
16 Jan ,2022	**Sunday**

KVA DAV College for Women, Karnal

Lesson plan for the odd semester
(November, 2021 to February, 2022)

Name of the Teacher – Ms. Leena
Subject- Computers
Paper-I Logical Organization of Computers
Class- BCA I

3rdweek **17 Jan – 22 Jan**	Half-Adder, Full-Adder, Half-Subtractor.
23 Jan ,2022	**Sunday**
4th Week **24 Jan – 29 Jan**	**Sessionals**
26 Jan, 2022 **30 Jan ,2022**	**Republic Day** **Sunday**
Feb, 2021 1st week **31 Jan -4 Feb**	**Encoders, Decoders, Multiplexers,**
5 Feb, 2022 **6 Feb ,2022**	**Vasant Panchmi** **Sunday**
2nd week **10 Feb- 12 Feb**	**Demultiplexers, Comparators, Code Converters**
13 Feb ,2022	**Sunday**
3rd week **14 Feb- 15 Feb**	**Revision of all Syllabus**