**DEPARTMENT OF COMPUTER SCIENCE AND APPLICATIONS**

**KURUKSHETRA UNIVERSITY, KURUKSHETRA**

Lesson Plan of February-2015

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Faculty Name: - Dr. Rajender Nath** | | | | | | | |
| **DATE** | | | | **CLASS** | **Paper** | **TOPIC** | **REF. BOOKS** |
| 02/2/2015  Monday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | Unified Process (UP): UP structure, phases of UP | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education. |
| 04/2/2015  Wednesday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | Functional and Non-functional Requirements; Requirement Attributes, Finding Requirements | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 05/2/2015  Thursday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | Use Case Modeling: Finding Actors and Use Cases | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 09/2/2015  Monday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | Use Case Scenario – main flow, branching within a flow | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 10/2/2015  Tuesday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | repletion within a flow, modeling alternative flows | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 11/2/2015  Wednesday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | relationships among actors and use case | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 12/2/2015  Thursday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | use case diagrams | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 16/2/2015  Monday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | Analysis: Meta Model, Workflows | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 18/2/2015  Wednesday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | Finding Analysis Classes – using noun/verb analysis | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 19/2/2015  Thursday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | CRC analysis using RUP stereotypes - entity, boundary and control | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 23/2/2015  Monday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | dependencies (usage, abstraction, permission) | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 24/2/2015  Tuesday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | class generalization, generalization sets | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 25/2/2015  Wednesday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | power types; Analysis Package – nested packages, dependencies, transitivity | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| 26/2/2015  Thursday | | | | M.Tech. 2nd Sem. | OBJECT ORIENTED ANALYSIS & DESIGN USING UML (MT-CSE-14-21) | package generalization, architectural analysis, finding analysis packages | 1. Jim Arlow, Ila Neustadt, “UML 2 and the Unified Process – Practical Object Oriented Analysis and Design”, Pearson Education.  2. Bernd Bruegge, Allen H. Dutoit, “Object Oriented Software Engineering using UML”, Pearson Education.  3. Blaha M., Rumbaugh J., “Object-Oriented Modeling and Design with UML”, Pearson Education |
| **MCA-14-23 PRINCIPLES OF PROGRAMMING LANGUAGES**  **Dr. Rakesh Kumar** | | | | | | | |
| 1 | History of Programming Languages, Qualities of good programming languages, | | | | | | |
| 2 | Programming Language Paradigms – Procedure Oriented, Object-oriented, Problem-oriented, functional, logical, event-oriented etc. | | | | | | |
| 3 | Effect of Programming environments on features of programming languages | | | | | | |
| 4 | Concept of Binding and binding time | | | | | | |
| 5 | Compilation and its different phases | | | | | | |
| 6 | Concept of formal languages and Language Grammar, BNF Grammar | | | | | | |
| 7 | Chomsky hierarchy of formal languages | | | | | | |
| 8 | Introduction to automata: Different types of automata, Deterministic and Non-deterministic, Push Down Automata | | | | | | |
| 9 | Regular Grammar and FSA | | | | | | |
| 10 | Context free grammar and Push Down Automata | | | | | | |
| 11 | Context Sensitive and Phrase structure grammar | | | | | | |
| 12 | Ambiguous Grammar | | | | | | |
| 13 | Parsing: Difference between Top down and Bottom up parsing | | | | | | |
| 14 | Recursive Descent Parsing: As an example of top-down parsing | | | | | | |
| 15 | Operator precedence parsing: As an example of Bottom-up parsing | | | | | | |
| 16 | Attribute grammars,Denotational semantics, Program verification and validation, | | | | | | |
| 17 | Data types: Specification and Implementation of Integer, Float. | | | | | | |
| 18 | Data types: Specification and Implementation of Char and Enumerated data types | | | | | | |
| 19 | Specification and Implementation of data structures: Array, Strings. | | | | | | |
| 20 | Specification and Implementation of data structures: Files, Union, Structures etc. | | | | | | |
| 21 | Type Checking and Type Conversion: Type equivalence – Name and structural equivalence, Static and Dynamic Type Checking, | | | | | | |
| 22 | Implicit and Explicit Type declaration and their merits and demerits, Narrowing and widening type conversion, Implicit and explicit type conversion | | | | | | |
| 23 | Object Oriented Programming languages features: Concept of abstraction, difference between control, procedural and data abstraction, Information hiding encapsulation | | | | | | |
| 24 | Polymorphism: Run-time and compile-time polymorphism, Function overloading and operator overloading | | | | | | |
| 25 | Software Reuse and Inheritance, Types of Inheritance, Multiple Inheritance | | | | | | |
| 26 | Concept of Final class and abstract classes, Virtual Functions | | | | | | |
| 27 | Concept of Sequence control, Implicit and Explicit Sequence Control, Sequence control within statement – Precedence of Operators, Associativity of Operators, | | | | | | |
| 28 | Sequence control Between statements: Goto controversy and concept of structured programming, Control structures for iteration, alternation and sequencing, | | | | | | |
| 29 | Subprogram sequence control | | | | | | |
| 30 | Subprogram and parameter passing techniques: Call By value, and Call by reference | | | | | | |
| 31 | Parameter passing Techniques: Call by result, Call By Value Result and Call by Name | | | | | | |
| 32 | Concept of Static and Dynamic Scope | | | | | | |
| 33 | Static and Dynamic Storage Management and their merits and demerits, | | | | | | |
| 34 | Concept of problems like garbage and dangling reference and their potential solutions. | | | | | | |
| 35 | Heap Storage management | | | | | | |
| 36 | Types of Subprogram: Simple Call-return | | | | | | |
| 37 | Exception Handlers, Coroutines, Scheduled subprogram, Concurrent Programs, | | | | | | |
| 38 | Concept of Parallel programming, Problems of synchronization in Concurrent processing and their solutions | | | | | | |
| 39 | Processor Design, Hardware and Software architectures, | | | | | | |
| 40 | Network Programming, Evolution of scripting languages, | | | | | | |
| 41 | Introduction to Applets, | | | | | | |
| 42 | Introduction to XML. | | | | | | |
| **MT – CSE – 14 – 23(i) SOFTWARE QUALITY MODELS & TESTING**  **Dr. Rakesh Kumar** | | | | | | | | |
| 1 | | Concepts of Software Quality, Quality Attributes, | | | | | | |
| 2 | | McCall's Quality Model, | | | | | | |
| 3 | | Boehm's quality Model | | | | | | |
| 4 | | ISO-9000 Quality Model | | | | | | |
| 5 | | Capability Maturity Model (CMM) | | | | | | |
| 6 | | Need for testing, Worst Accidents caused by software failure – Mariner I, Therac 20, Y2K, etc., | | | | | | |
| 7 | | Verification and Validation | | | | | | |
| 8 | | Psychology of testing | | | | | | |
| 9 | | Error, fault and failure, types of bugs, Error of omission and commission | | | | | | |
| 10 | | Bohr bug, Heisen bug, Observer effect in Information Technology | | | | | | |
| 11 | | Types of testing, Unit & Integration Testing | | | | | | |
| 12 | | White box testing – Adequacy criteria, control flow graph, control flow based testing | | | | | | |
| 13 | | McCabe's Cyclomatic Complexity | | | | | | |
| 14 | | Statement, branch and path coverage adequacy criteria | | | | | | |
| 15 | | Loop testing, | | | | | | |
| 16 | | Mutation testing – competent programmer hypothesis, coupling effect hypothesis | | | | | | |
| 17 | | Strong and weak mutant, mutation testing in procedure oriented and object oriented programming | | | | | | |
| 18 | | Data flow based testing, Difference between control-flow and data-flow based testing, | | | | | | |
| 19 | | Adequacy criteria in data-flow based testing: APU, APU+C, ACU, ACU+P, All path etc. adequacy criteria | | | | | | |
| 20 | | Black box testing, Equivalence class partitioning | | | | | | |
| 21 | | Boundary value analysis | | | | | | |
| 22 | | Cause effect graphing | | | | | | |
| 23 | | Robustness testing, load testing, stress testing | | | | | | |
| 24 | | Acceptance testing: α, β, and γ testing. | | | | | | |
| 25 | | Software configuration management (SCM), Configuration items, baseline, Goal of SCM | | | | | | |
| 26 | | Change management, Version Control | | | | | | |
| 27 | | Configuration Accounting, Configuration Audits | | | | | | |
| 28 | | Formal Technical review (FTR), review meeting, composition of review team, review guidelines | | | | | | |
| 29 | | Code inspection, Walk through, | | | | | | |
| 30 | | Testing Object-oriented software, Difference between testing of object-oriented and procedure-oriented software | | | | | | |
| 31 | | Class testing strategies, Class Modality, State based Testing, Message Sequence Specification. | | | | | | |
| 32 | | Testability and related issues, | | | | | | |
| 33 | | Design for Testability, Observability & Controllability, | | | | | | |
| 34 | | Design by Contract, | | | | | | |
| 35 | | Precondition, Post condition and Invariant, | | | | | | |
| 36 | | Regression Testing, Challenges, test optimization. | | | | | | |
| 37 | | Testing Client server applications, | | | | | | |
| 38 | | Testing compilers and language processors, | | | | | | |
| 39 | | Testing web enabled applications, | | | | | | |
| 40 | | Ad hoc testing: Buddy testing, pair testing, | | | | | | |
| 41 | | Exploratory testing, Agile and extreme testing | | | | | | |

**MS-21 Data Communication and Computer Networks**

Name of the teacher: Dr. Shuchita Upadhyaya

Class: M.Sc. 2nd Semester

Lesson plan for the month of February as per Time Table (Monday to Thursday 11am to 12 noon)

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **S.No** | | **Date** | **Topic** | | **Books to be followed** |
| **1** | | 27-01-15 | Introduction to Computer Networks and its uses, | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Behrouz A Forouzan, TMH -Introduction to Data communications and Networking, 5/e |
| **2** | | 28-02-15 | Classification of Networks: Criteria-Scale, Transmission Technology, Topology; | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Michael A. Gallo, William M. Hancock, “Computer Communications and Networking Technologies”, CENGAGE Learning. |
| **3** | | 29-02-15 | Local Area Networks (LAN) and their topologies, transmission technology and design issues; IEEE LAN standards based on the above topologies; Introduction to MANs | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Behrouz A Forouzan, TMH -Introduction to Data communications and Networking, 5/e 3. Michael A. Gallo, William M. Hancock, “Computer Communications and Networking Technologies”, CENGAGE Learning. |
| 4 | | 02-02-15 | Duty Leave | |  |
| 5 | | 04-02-15 | Metropolitan Area Networks (MAN) and its standards; Wide Area Networks (WAN) and their transmission technology, topologies and design issues | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Behrouz A Forouzan, TMH -Introduction to Data communications and Networking, 5/e 3. Michael A. Gallo, William M. Hancock, “Computer Communications and Networking Technologies”, CENGAGE Learning. |
| 6 | | 05-02-15 | Duty Leave | |  |
| 7 | | 09-02-15 | Network Architecture, design issues, and introduction to OSI Reference model, | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Behrouz A Forouzan, TMH -Introduction to Data communications and Networking, 5/e |
| 8 | | 10-02-15 | Functions of layers of OSI reference model | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Behrouz A Forouzan, TMH -Introduction to Data communications and Networking, 5/e |
| 9 | | 11-02-15 | TCP/IP Reference model, its various protocols and their functions | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Behrouz A Forouzan, TMH -Introduction to Data communications and Networking, 5/e |
| 10 | | 12-02-15 | Comparison of OSI and TCP/IP Models; Introduction to Example Networks: Internet, | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Behrouz A Forouzan, TMH -Introduction to Data communications and Networking, 5/e |
| 11 | | 16-02-15 | Frame Relay, SMDS, Broadband ISDN, ATM. | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Behrouz A Forouzan, TMH -Introduction to Data communications and Networking, 5/e |
| 12 | | 18-02-15 | Data Communication Model, Channel capacity, bit rate, baud, bandwidth, | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Behrouz A Forouzan, TMH -Introduction to Data communications and Networking, 5/e 3. Michael A. Gallo, William M. Hancock, “Computer Communications and Networking Technologies”, CENGAGE Learning. |
| 13 | | 19-02-15 | Nyquist bit rate, Guided Transmission Media – Twisted Pair, its categories, physical characterstics and applications | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Michael A. Gallo, William M. Hancock, “Computer Communications and Networking Technologies”, CENGAGE Learning. 3. Data and Computer Communications, 5th Edition – William Stallings, PHI. |
| 14 | | 23-02-15 | Coaxial cable, its categories, physical characterstics and applications; Optical fiber its , physical characterstics and applications | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Michael A. Gallo, William M. Hancock, “Computer Communications and Networking Technologies”, CENGAGE Learning. 3. Data and Computer Communications, 5th Edition – William Stallings, PHI. |
| 15 | | 24-02-15 | wireless transmission – Radio waves, microwaves, infrared waves; Lightwave transmission; | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Data and Computer Communications, 5th Edition – William Stallings, PHI. |
| 16 | | 25-02-15 | Satellite communication. | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Michael A. Gallo, William M. Hancock, “Computer Communications and Networking Technologies”, CENGAGE Learning. 3. Data and Computer Communications, 5th Edition – William Stallings, PHI. |
| 17 | | 26-02-15 | Switching: Circuit Switching, Packet Switching; | | 1. Andrew S. Tanenbaum, PHI- Computer Networks, 5/e 2. Michael A. Gallo, William M. Hancock, “Computer Communications and Networking Technologies”, CENGAGE Learning. 3. Data and Computer Communications, 5th Edition – William Stallings, PHI. |
| |  |  | | --- | --- | | **Dr. Ramesh Kait**  MCA-14-22  Section A & B  OOPs Using C++ | | | Dates of lectures | Topics | | 9-02-2015 | Introductions to OOPs languages | | 10-02-2015 | Concepts and fundamental of C++ | | 11-02-2015 | Token Expression and Control structures | | 12-02-2015 | Functions in C++ | | 16-02-2015 | Functions in C++ | | 18-02-2015 | Classes and Objects | | 19-02-2015 | Classes and Objects based Programs | | 23-02-2015 | Operator Overloading and Type Conversions | | 24-02-2015 | Inheritance: Extended Classes | | 25-02-2015 | Inheritance: Extended Classes | | 26-02-2015 | Virtual Functions and Polymorphism | | | | | | |
| MS-22  Lecture Plan of Java Programming  Time- 4:00 p.m. to 5:00 p.m.  **Ms Monika** | | | | | |
| Dates of lectures | | | Topics | | |
| 9-02-2015 | | | Operators and Expressions | | |
| 10-02-2015 | | | Operators and Expressions | | |
| 11-02-2015 | | | Decision Making & Branching | | |
| 12-02-2015 | | | Looping | | |
| 16-02-2015 | | | Introducing classes, objects and methods: defining a class, adding variables and methods | | |
| 18-02-2015 | | | Creating objects, constructors | | |
| 19-02-2015 | | | Class inheritance | | |
| 23-02-2015 | | | Arrays and String: Creating an array, one and two dimensional arrays | | |
| 24-02-2015 | | | String array and methods | | |
| 25-02-2015 | | | Interfaces | | |
| 26-02-2015 | | | Packages | | |

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Dr. Kanwal Garg**  **Paper Code: MCA- 402 (Data Warehousing and Data Mining)** | | | | |
| **Date** | **Class** | **Paper** | **Topic** | **References Book** |
| 02/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | The Evolution of Data Warehousing (The Historical Context), The Data Warehouse - A Brief History, Characteristics, | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | The Evolution of Data Warehousing (The Historical Context), The Data Warehouse - A Brief History, Characteristics, | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 04/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | Operational Database Systems and Data Warehouse (OLTP & OLAP), Today’s Development Environment, Data Marts, Metadata. | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | Operational Database Systems and Data Warehouse (OLTP & OLAP), Today’s Development Environment, Data Marts, Metadata. | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 10/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | Types of Data and their Uses, from Tables and Spreadsheets to Data Cubes | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | Types of Data and their Uses, from Tables and Spreadsheets to Data Cubes | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 11/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | Identifying Facts and Dimensions, Designing Fact Tables, Designing Dimension Tables, Data Warehouse Schemas | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | Identifying Facts and Dimensions, Designing Fact Tables, Designing Dimension Tables, Data Warehouse Schemas | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 12/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | OLAP Operations. | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | OLAP Operations. | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 16/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | System Processes, Data Warehousing Components | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | System Processes, Data Warehousing Components | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 18/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | Architecture for a Data Warehouse, Three-tier Data Warehouse Architecture | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | Architecture for a Data Warehouse, Three-tier Data Warehouse Architecture | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 19/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | Steps for the Design and Construction of Data Warehouses. | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | Steps for the Design and Construction of Data Warehouses. | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 23/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | Implementation: Methods for the Implementation of Data Warehouse Systems. | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | Implementation: Methods for the Implementation of Data Warehouse Systems. | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 24/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | Group Discussion Covering the Entire contents of Unit- I  Remedial/ Bridge Class (play and game method) lecture for slow learner. | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | Group Discussion Covering the Entire contents of Unit- I  Remedial/ Bridge Class (play and game method) lecture for slow learner. | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 25/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | Data Mining: Introduction: Motivation, Importance, Knowledge Discovery Process, KDD and Data Mining, Data Mining vs. Query Tools | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | Data Mining: Introduction: Motivation, Importance, Knowledge Discovery Process, KDD and Data Mining, Data Mining vs. Query Tools | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| 26/02/2015 | MCA 4th Semester Section A | MCA-402 (Data Warehousing And Data Mining) | Kind of Data, Functionalities, Interesting Patterns, Classification of Data Mining Systems | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |
| MCA 4th Semester Section B | MCA-402 (Data Warehousing And Data Mining) | Kind of Data, Functionalities, Interesting Patterns, Classification of Data Mining Systems | * Berson, S.J. Smith, “Data Warehousing, Data Mining & OLAP”, Tata McGraw-Hill. * J Hanes, M. Kamber, “Data Mining Concepts and Techniques”, Morgan Kaufmann Publishers, 2002. |

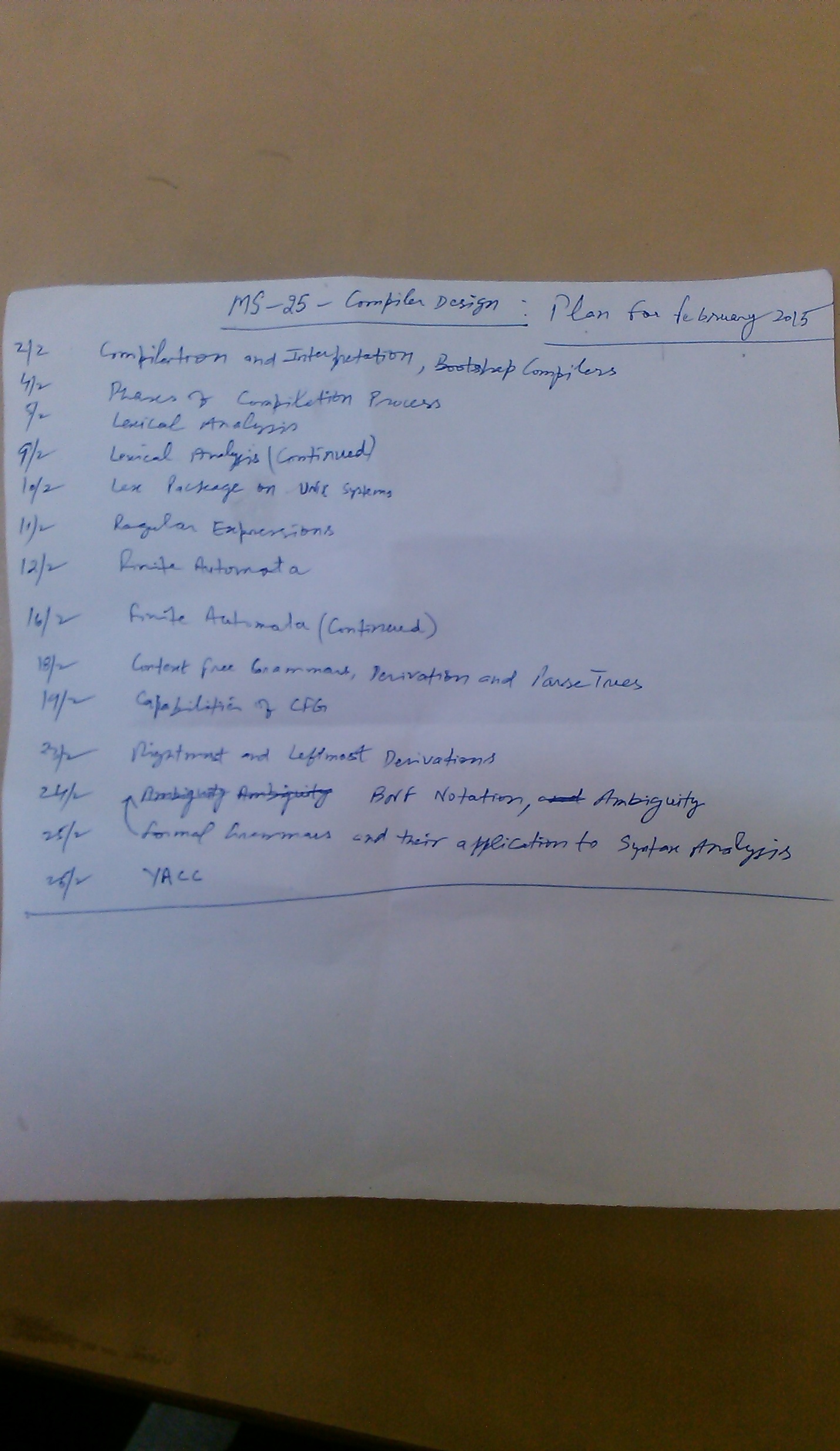
|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Name of the Teacher:** Dr. Sanjay Tyagi | | | | |
| **Date** | **Class** | **Paper** | **Topic** | **References** |
| 11/2/2015  (2 Hours) | M.SC. C.SC. II SEMESTER | MS-23 (LINUX & SHELL PROGRAMMING) | Architecture and Features of Linux/Unix | Your Unix - The Ultimate Guide by Sumitabha Das  Linux – A Practical Approach by B.Mohamed Ibrahim |
| 13/2/2015  (2 Hours) | M.SC. C.SC. II SEMESTER | MS-23 (LINUX & SHELL PROGRAMMING) | Directory Oriented Commands | Your Unix - The Ultimate Guide by Sumitabha Das  Linux – A Practical Approach by B.Mohamed Ibrahim |
| 19/2/2015  (2 Hours) | M.SC. C.SC. II SEMESTER | MS-23 (LINUX & SHELL PROGRAMMING) | File Oriented Commands | Your Unix - The Ultimate Guide by Sumitabha Das  Linux – A Practical Approach by B.Mohamed Ibrahim |
| 21/2/2015  (2 Hours) | M.SC. C.SC. II SEMESTER | MS-23 (LINUX & SHELL PROGRAMMING) | Process Oriented Commands | Your Unix - The Ultimate Guide by Sumitabha Das  Linux – A Practical Approach by B.Mohamed Ibrahim |
| 27/2/2015  (2 Hours) | M.SC. C.SC. II SEMESTER | MS-23 (LINUX & SHELL PROGRAMMING) | General Purpose commands in Linux – I | Your Unix - The Ultimate Guide by Sumitabha Das  Linux – A Practical Approach by B.Mohamed Ibrahim |
| 28/2/2015  (2 Hours) | M.SC. C.SC. II SEMESTER | MS-23 (LINUX & SHELL PROGRAMMING) | General Purpose commands in Linux – II | Your Unix - The Ultimate Guide by Sumitabha Das  Linux – A Practical Approach by B.Mohamed Ibrahim |

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Date** | **Class** | **Paper** | **Topic** | **References** |
| 9/2/2015 | M.C.A. IV SEMESTER | MCA-405 (ELECTIVE-ii) MANAGEMENT INFORMATION SYSTEM | Trends in Information Systems | Management Information Systems Managing the Digital Firm, Kenneth C.Laudon, Jane P.Laudon  Management Information Systems, James A O’Brien, George M Marakas |
| 10/2/2015 | M.C.A. IV SEMESTER | MCA-405 (ELECTIVE-ii) MANAGEMENT INFORMATION SYSTEM | Types of Information Systems | Management Information Systems Managing the Digital Firm, Kenneth C.Laudon, Jane P.Laudon  Management Information Systems, James A O’Brien, George M Marakas |
| 11/2/2015 | M.C.A. IV SEMESTER | MCA-405 (ELECTIVE-ii) MANAGEMENT INFORMATION SYSTEM | Managerial Challenges of Information Technology | Management Information Systems Managing the Digital Firm, Kenneth C.Laudon, Jane P.Laudon  Management Information Systems, James A O’Brien, George M Marakas |
| 18/2/2015 | M.C.A. IV SEMESTER | MCA-405 (ELECTIVE-ii) MANAGEMENT INFORMATION SYSTEM | The Components of Information System - II | Management Information Systems Managing the Digital Firm, Kenneth C.Laudon, Jane P.Laudon  Management Information Systems, James A O’Brien, George M Marakas |
| 19/2/2015 | M.C.A. IV SEMESTER | MCA-405 (ELECTIVE-ii) MANAGEMENT INFORMATION SYSTEM | Components of an Information System – II | Management Information Systems Managing the Digital Firm, Kenneth C.Laudon, Jane P.Laudon  Management Information Systems, James A O’Brien, George M Marakas |
| 21/2/2015 | M.C.A. IV SEMESTER | MCA-405 (ELECTIVE-ii) MANAGEMENT INFORMATION SYSTEM | Information System Resources-I | Management Information Systems Managing the Digital Firm, Kenneth C.Laudon, Jane P.Laudon  Management Information Systems, James A O’Brien, George M Marakas |
| 23/2/2015 | M.C.A. IV SEMESTER | MCA-405 (ELECTIVE-ii) MANAGEMENT INFORMATION SYSTEM | Information System Resources-II | Management Information Systems Managing the Digital Firm, Kenneth C.Laudon, Jane P.Laudon  Management Information Systems, James A O’Brien, George M Marakas |
| 24/2/2015 | M.C.A. IV SEMESTER | MCA-405 (ELECTIVE-ii) MANAGEMENT INFORMATION SYSTEM | Information System Activities-I | Management Information Systems Managing the Digital Firm, Kenneth C.Laudon, Jane P.Laudon  Management Information Systems, James A O’Brien, George M Marakas |
| 25/2/2015 | M.C.A. IV SEMESTER | MCA-405 (ELECTIVE-ii) MANAGEMENT INFORMATION SYSTEM | Information System Activities-II | Management Information Systems Managing the Digital Firm, Kenneth C.Laudon, Jane P.Laudon  Management Information Systems, James A O’Brien, George M Marakas |
| 26/2/2015 | M.C.A. IV SEMESTER | MCA-405 (ELECTIVE-ii) MANAGEMENT INFORMATION SYSTEM | Recognizing Information Systems | Management Information Systems Managing the Digital Firm, Kenneth C.Laudon, Jane P.Laudon  Management Information Systems, James A O’Brien, George M Marakas |

|  |  |
| --- | --- |
| **MCA-14-23 (Section B)**  **PRINCIPLES OF PROGRAMMING LANGUAGES**  **Dr. Vishal Verma** | |
| 1 | History of Programming Languages, Qualities of good programming languages, |
| 2 | Programming Language Paradigms – Procedure Oriented, Object-oriented, Problem-oriented, functional, logical, event-oriented etc. |
| 3 | Effect of Programming environments on features of programming languages |
| 4 | Concept of Binding and binding time |
| 5 | Compilation and its different phases |
| 6 | Concept of formal languages and Language Grammar, BNF Grammar |
| 7 | Chomsky hierarchy of formal languages |
| 8 | Introduction to automata: Different types of automata, Deterministic and Non-deterministic, Push Down Automata |
| 9 | Regular Grammar and FSA |
| 10 | Context free grammar and Push Down Automata |
| 11 | Context Sensitive and Phrase structure grammar |
| 12 | Ambiguous Grammar |
| 13 | Parsing: Difference between Top down and Bottom up parsing |
| 14 | Recursive Descent Parsing: As an example of top-down parsing |
| 15 | Operator precedence parsing: As an example of Bottom-up parsing |
| 16 | Attribute grammars,Denotational semantics, Program verification and validation, |
|  | |  | | --- | | **Vishal Verma ,**  **Lesson Plan for Feb-2015**  **MTCSE-14-23(iii)** | | 1. Database concepts and Architecture, 3 level architecture | | 1. ER Model , EER Model | | 1. Inheritance, specialization, generalization, subclasses and super classes | | 1. Object identity, structure, encapsulation of operation, persistence, method | | 1. Type hierarchies, inheritance, complex objects | | 1. Query processing and optimization | | 1. Semantic query optimization, database tuning in relational system | | 1. Parallel database, distributed data base, | | 1. Data fragmentation and replication, data allocation technique | | 1. Temporal database, spatial database, multimedia database, deductive database | | 1. Client server architecture, active database concept and triggers | | 1. Principles of big database, ontologies and semantics, | |  | |
|  |  |

|  |
| --- |
| Lecture Plan For feberuary-2015  Java Programming  Dr. Chander Kant |
| Topics |
| 1. Operators and Expressions |
| 1. Operators and Expressions |
| 1. Decision Making & Branching |
| 1. Looping |
| 1. Introducing classes, objects and methods: defining a class, adding variables and methods |
| 1. Creating objects, constructors |
| 1. Class inheritance |
| 1. Arrays and String: Creating an array, one and two dimensional arrays |
| 1. String array and methods |
| 1. Interfaces |
| 1. Packages |
|  |

Dr. R. K. Chauhan



|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Faculty Name: - Anil Saini** | | | | |
| **DATE** | **CLASS** | **Paper** | **TOPIC** | **REFERENCES** |
| 02/2/2015  Monday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | Internet Services, Internet Architecture | [1] [3] |
| 04/2/2015  Wednesday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | Backbone Networks, High Performance Networks | [1] [2] [3] |
| 05/2/2015  Thursday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | TCP Services, TCP Format and Connection Management | [1] [2] [3] |
| 06/2/2015  Friday | MCA 4th Sem. (B) | Web Engineering (MCA-401) | The role of the Information Architect, Collaboration and Communication. | [4] |
| MCA 4th Sem. (B) | Web Engineering (MCA-401) | Organizing Information, Organizational Challenges, Organizing Web sites and Intranets | [4] |
| 07/2/2015  Saturday | MCA 4th Sem. (B) | Web Engineering (MCA-401) | Creating Cohesive Organization Systems Designing Navigation Systems, | [4] |
| MCA 4th Sem. (B) | Web Engineering (MCA-401) | Types of Navigation systems, Integrated Navigation Elements, Remote Navigation Elements. | [4] |
| 09/2/2015  Monday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | UDP Services, Format and Encapsulation in IP | [1] [3] |
| 10/2/2015  Tuesday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | IP Services, Header Format and Addressing, | [1] [2] [3] |
| 11/2/2015  Wednesday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | Fragmentation and Reassembly, classless and subnet address Extensions | [1] [2] [3] |
| 12/2/2015  Thursday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | Subnetting and Supernetting | [1] [3] |
| 13/9/2014  Friday | MCA 4th Sem. (B) | Web Engineering (MCA-401) | Designing Elegant Navigation Systems, Searching Systems, Searching your Web Site. | [4] |
| MCA 4th Sem. (B) | Web Engineering (MCA-401) | Designing the Search Interface, Indexing the Right Stuff, To search or Not To Search, Grouping Content. | [4] |
| 16/2/2015  Monday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | Classless Inter Domain Routing (CIDR) | [1] [2] [3] |
| 18/2/2015  Wednesday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | IPv6 (Internet Protocol Version 6) | [1] [3] |
| 19/2/2015  Thursday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | Congestion Control and Quality of Services | [1] [2] [3] |
| 20/2/2015  Friday | MCA 4th Sem. (B) | Web Engineering (MCA-401) | Conceptual Design, High-Level Architecture Blueprints, Architectural Page Mockups, Design Sketches | [4] |
| MCA 4th Sem. (B) | Web Engineering (MCA-401) | HTML Basic Concepts, Good Web Design, Process of Web Publishing | [4] |
| 21/2/2015  Saturday | MCA 4th Sem. (B) | Web Engineering (MCA-401) | Phases of Web Site development, Structure of HTML documents | [4] |
| MCA 4th Sem. (B) | Web Engineering (MCA-401) | HTML Elements-Core attributes, Language attributes, Core Events, | [5] [6] |
| 23/2/2015  Monday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | Data Traffic , Network Performance, Effect of Congestions | [1] [3] |
| 24/2/2015  Tuesday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | Congestion Control, Congestion Control in TCP and Frame Relay | [1] [3] |
| 25/2/2015  Wednesday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | Link-Level Flow and Error Control, TCP Flow Control | [1] [2] [3] |
| 26/2/2015  Thursday | M.Tech. 2nd Sem. | High Performance  Networks  (MT-CSE-14-23(ii)) | QoS: Flow Characteristics, Flow Classes, Techniques to improve QoS, Traffic Engineering | [1] [2] [3] |
| 27/2/2015  Friday | MCA 4th Sem. (B) | Web Engineering (MCA-401) | Block Level Events, Text Level Events, Linking Basics, Linking in HTML | [5] [6] |
| MCA 4th Sem. (B) | Web Engineering (MCA-401) | Images and Anchors, Anchor Attributes, Image maps, Semantic Linking Meta Information | [5] [6] |
| 28/2/2015  Saturday | MCA 4th Sem. (B) | Web Engineering (MCA-401) | Introduction to Layout: Backgrounds, Colors and Text, Fonts, Layout with Tables. Advanced Layout: Frames and Layers. | [5] [6] |
| MCA 4th Sem. (B) | Web Engineering (MCA-401) | HTML and other media types. Audio Support in Browsers, Video Support, Other binary Formats. | [5] [6] |

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Faculty Name: - Ms. Anu** | | | | |
| **DATE** | **CLASS** | **Paper** | **TOPIC** | **REFERENCES** |
| 02/2/2015  Monday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Theory of Computation: Formal Language | [1] [2] |
| MCA 4th Sem. (B) | Object Oriented Methodology  (MCA-404) | UML: Principles of modeling | [3] [4] |
| 04/2/2015  Wednesday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Need for formal computational models | [1] [2] |
| MCA 4th Sem. (A) | Object Oriented MethodologY  (MCA-404) | UML: Principles of modeling | [3] [4] |
| MCA 4th Sem. (B) | Object Oriented Methodology  (MCA-404) | UML Things – Structural, Behavioral, Grouping, Annotational | [3] [4] |
| 05/2/2015  Thursday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Non-computational problems | [1] [2] |
| MCA 4th Sem. (A) | Object Oriented MethodologY  (MCA-404) | UML Things – Structural, Behavioral, Grouping, Annotational | [3] [4] |
| 09/2/2015  Monday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Diagonal argument | [1] [2] |
| MCA 4th Sem. (B) | Object Oriented Methodology  (MCA-404) | Relationships in UML – Dependency, Association, Generalization, Realization | [3] [4] |
| 10/2/2015  Tuesday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Russel’s paradox | [1] [2] |
| MCA 4th Sem. (A) | Object Oriented MethodologY  (MCA-404) | Relationships in UML – Dependency, Association, Generalization, Realization | [3] [4] |
| MCA 4th Sem. (B) | Object Oriented Methodology  (MCA-404) | Diagrams in UML – Class diagram | [3] [4] |
| 11/2/2015  Wednesday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Deterministic Finite Automaton (DFA) | [1] [2] |
| MCA 4th Sem. (A) | Object Oriented MethodologY  (MCA-404) | Diagrams in UML – Class diagram | [3] [4] |
| MCA 4th Sem. (B) | Object Oriented Methodology  (MCA-404) | Object diagram, Use-Case diagram | [3] [4] |
| 12/2/2015  Thursday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Non-deterministic Finite Automaton (NFA) | [1] [2] |
| MCA 4th Sem. (A) | Object Oriented MethodologY  (MCA-404) | Object diagram, Use-Case diagram | [3] [4] |
| 16/2/2015  Monday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Regular Languages | [1] [2] |
| MCA 4th Sem. (B) | Object Oriented MethodologY  (MCA-404) | Sequence diagram, Collaboration diagram | [3] [4] |
| 18/2/2015  Wednesday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Regular Sets | [1] [2] |
| MCA 4th Sem. (A) | Object Oriented MethodologY  (MCA-404) | Sequence diagram, Collaboration diagram | [3] [4] |
| MCA 4th Sem. (B) | Object Oriented Methodology  (MCA-404) | State chart diagram, Activity diagram, Component diagram | [3] [4] |
| 19/2/2015  Thursday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Equivalence of DFA and NFA | [1] [2] |
|  | MCA 4th Sem. (A) | Object Oriented MethodologY  (MCA-404) | State chart diagram, Activity diagram, Component diagram | [3] [4] |
| 23/2/2015  Monday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Kleen's characterization theory for sets accepted by finite automata | [1] [2] |
| MCA 4th Sem. (B) | Object Oriented MethodologY  (MCA-404) | Deployment diagram. UML Semantic Rules – Names, Scope, Visibility, Integrity, Execution | [3] [4] |
| 24/2/2015  Tuesday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Kleen's characterization theory for sets accepted by finite automata | [1] [2] |
| MCA 4th Sem. (A) | Object Oriented MethodologY  (MCA-404) | Deployment diagram. UML Semantic Rules – Names, Scope, Visibility, Integrity, Execution | [3] [4] |
| MCA 4th Sem. (B) | Object Oriented Methodology  (MCA-404) | Mechanisms in the UML – Specifications, Adornments | [3] [4] |
| 25/2/2015  Wednesday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Minimizing the number of states of a DFA | [1] [2] |
| MCA 4th Sem. (A) | Object Oriented MethodologY  (MCA-404) | Mechanisms in the UML – Specifications, Adornments | [3] [4] |
| MCA 4th Sem. (B) | Object Oriented Methodology  (MCA-404) | Common Divisions, Extensibility Mechanisms. | [3] [4] |
| 26/2/2015  Thursday | MCA 4th Sem. | THEORY OF COMPUTATION (MCA-405 (IV)) | Minimizing the number of states of a DFA | [1] [2] |
| MCA 4th Sem. (A) | Object Oriented MethodologY  (MCA-404) | Common Divisions, Extensibility Mechanisms. | [3] [4] |

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Faculty Name: - Mrs. Yogita Sangwan** | | | | | | | |
| **DATE** | | **CLASS** | | **Paper** | **TOPIC** | | **REF. BOOKS** |
| 02/2/2015  Monday | | MCA-1STA  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | Introduction of Web Engineering andWeb Application | | Internet & World Wide Web How to Program, Pearson education, 3rd edition, by: H.M. Deitel, P.J. Deitel, A.B. Goldberg.  Programming with World Wide Web, Pearson education, 4th edition, by: Sebesta |
| 04/2/2015  Wednesday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | Web Application vs Conventional Software | | Thomas A Powell, HTML-The Complete Reference, Tata McGraw Hill  Programming with World Wide Web, Pearson education, 4th edition, by: Sebesta |
| 05/2/2015  Thursday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | Categories and characteristics of web applications | | HTML-The Complete Reference, Tata McGraw Hill, Pearson education, 3rd edition, by: H.M. Deitel, P.J. Deitel |
| 09/2/2015  Monday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | Introduction to internet and basic protocols | | Jeffery C.Jackson,”web technologies”,pearson education,india, Thomas powerll,”the complete refrence HTML”, tata mcgraw hill,india |
| 10/2/2015  Tuesday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | www & http | | HTML-The Complete Reference, Tata McGraw Hill, Pearson education, 3rd edition, by: H.M. Deitel, P.J. Deitel |
| 11/2/2015  Wednesday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | HTTP structure of request and response messages | | Jeffery C.Jackson,”web technologies”,pearson education,india, Programming with World Wide Web |
| 12/2/2015  Thursday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | Web browser and its functions | | Thomas A Powell, HTML-The Complete Reference, Tata McGraw Hill  Programming with World Wide Web, Pearson education, 4th edition, by: Sebesta |
| 16/2/2015  Monday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | URL,Web serves and their features | | HTML-The Complete Reference, Tata McGraw Hill, Pearson education, 3rd edition, by: H.M. Deitel, P.J. Deitel |
| 18/2/2015  Wednesday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | Defining virtual hosts, secure serves | | Internet & World Wide Web How to Program, Pearson education, 3rd edition, by: H.M. Deitel, P.J. Deitel, A.B. Goldberg |
| 19/2/2015  Thursday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | Introduction to HTML, Characteristics | | Thomas A Powell, HTML-The Complete Reference, Tata McGraw Hill  Programming with World Wide Web, Pearson education, 4th edition, by: Sebesta |
| 23/2/2015  Monday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | XHTML syntax and semantics | | Internet & World Wide Web How to Program, Pearson education, 3rd edition, by: H.M. Deitel, P.J. Deitel, A.B. Goldberg |
| 24/2/2015  Tuesday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | Fundamental HTML elements, list, table | | Thomas A Powell, HTML-The Complete Reference, Tata McGraw Hill  Programming with World Wide Web, Pearson education, 4th edition, by: Sebesta |
| 25/2/2015  Wednesday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | Frames, forms, XHTML abstract syntax | | Internet & World Wide Web How to Program, Pearson education, 3rd edition, by: H.M. Deitel, P.J. Deitel, A.B. Goldberg |
| 26/2/2015  Thursday | | MCA-1ST A  MCA-1ST B | | WEB TECHNOLIGIES (MCA-14-25) | Creating HTML pages | | Jeffery C.Jackson,”web technologies”,pearson education,india, Programming with World Wide Web |
| **Dr. Pardeep Mittal**  **MCA–14-24 DATA STRUCTURES**  One month (01/02/15 to 28/02/15) lesson plan for MCA 2nd semester(Section – A & B)  Time: 2:00 PM – 3.00 PM (Room No. - 216) & 4:00 PM – 5.00 PM (Room No. - 205) | | | | | | | | | |
| **S.No** | | **Date** | | **Topic** | | | **Books to be followed** | | |
| 1 | | 02-02-15 | | Duty Leave | | | | | |
| 2 | | 04-02-15 | | Complexity of Algorithms | | | * G.A.V Pai, “Data Structures and Algorithms”, Tata McGraw-Hill, New Delhi. * Seymour Lipschutz, “Data Structures”, Tata McGraw-Hill, Schaum’s Outlines, New Delhi. | | |
| 3 | | 05-02-15 | | Duty Leave | | | | | |
| 4 | | 09-02-15 | | Duty Leave | | | | | |
| 5 | | 10-02-15 | | Asymptotic Notations | | | * G.A.V Pai, “Data Structures and Algorithms”, Tata McGraw-Hill, New Delhi. * Seymour Lipschutz, “Data Structures”, Tata McGraw-Hill, Schaum’s Outlines, New Delhi. | | |
| 6 | | 11-02-15 | | Duty Leave | | | | | |
| 7 | | 12-02-15 | | Array and its Representation | | | 1. G.A.V Pai, “Data Structures and Algorithms”, Tata McGraw-Hill, New Delhi. 2. Seymour Lipschutz, “Data Structures”, Tata McGraw-Hill, Schaum’s Outlines, New Delhi. | | |
| 8 | | 16-02-15 | | Traversal, Insertion and Deletion in an Array | | | 1. G.A.V Pai, “Data Structures and Algorithms”, Tata McGraw-Hill, New Delhi. 2. Seymour Lipschutz, “Data Structures”, Tata McGraw-Hill, Schaum’s Outlines, New Delhi. | | |
| 9 | | 18-02-15 | | Searching in an Array | | | 1. G.A.V Pai, “Data Structures and Algorithms”, Tata McGraw-Hill, New Delhi. 2. Seymour Lipschutz, “Data Structures”, Tata McGraw-Hill, Schaum’s Outlines, New Delhi. | | |
| 10 | | 19-02-15 | | Sorting an Array | | | 1. G.A.V Pai, “Data Structures and Algorithms”, Tata McGraw-Hill, New Delhi. 2. Seymour Lipschutz, “Data Structures”, Tata McGraw-Hill, Schaum’s Outlines, New Delhi. | | |
| 11 | | 23-02-15 | | Sorting contd. | | | 1. G.A.V Pai, “Data Structures and Algorithms”, Tata McGraw-Hill, New Delhi. 2. Seymour Lipschutz, “Data Structures”, Tata McGraw-Hill, Schaum’s Outlines, New Delhi. | | |
| 12 | | 24-02-15 | | String and its Memory Representation | | | 1. G.A.V Pai, “Data Structures and Algorithms”, Tata McGraw-Hill, New Delhi. 2. Seymour Lipschutz, “Data Structures”, Tata McGraw-Hill, Schaum’s Outlines, New Delhi. | | |
| 13 | | 25-02-15 | | Operations on Strings | | | 1. G.A.V Pai, “Data Structures and Algorithms”, Tata McGraw-Hill, New Delhi. 2. Seymour Lipschutz, “Data Structures”, Tata McGraw-Hill, Schaum’s Outlines, New Delhi. | | |
| 14 | | 26-02-15 | | Operations on Strings contd. | | | 1. G.A.V Pai, “Data Structures and Algorithms”, Tata McGraw-Hill, New Delhi. 2. Seymour Lipschutz, “Data Structures”, Tata McGraw-Hill, Schaum’s Outlines, New Delhi. | | |
| Dr. Pardeep Mittal  **MT-CSE–14-11 DESIGN & ANALYSIS OF ALGORITHMS**  One Month (01/09/14 to 30/09/14) lesson plan for M.Tech.(CSE) 1st Semester  Time: 10:00 Noon – 11.00 AM (Room No. - 216) | | | | | | | | | |
| **S.No** | | **Date** | | **Topic** | | | **Books to be followed** | | |
| 1 | | 02-09-14 | | Asymptotic Notations | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 2 | | 03-09-14 | | Standard Notations & Common Functions | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 3 | | 04-09-14 | | Recurrence Relations: Substitution Method | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 4 | | 08-09-14 | | Recurrence Relations: Recurrence Tree Method | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 5 | | 09-09-14 | | Recurrence Relations: Master Method | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 6 | | 10-09-14 | | Recurrence Realtions: Proof of Master Theorem | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 7 | | 11-09-14 | | An introduction to Probabilistic Analysis & Randomizing Algorithms | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 8 | | 15-09-14 | | Indicator Random Variables | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 9 | | 16-09-14 | | Randomized Algorithms | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 10 | | 17-09-14 | | Probabilistic Analysis | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 11 | | 18-09-14 | | Further use of indicator random variables | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 12 | | 22-09-14 | | Heapsort | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 13 | | 24-09-14 | | Heapsort contd. | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 14 | | 25-09-14 | | Quicksort | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |
| 15 | | 29-09-14 | | Quicksort contd. | | | 1. Cormen, Thomos, Leiserson, “Introduction to Algorithms”, Prentice Hall of India Learning. 2. Horowitz, Ellis and Sahni, Sartaj, “Fundamentals of Computer Algorithms”, University Science Press. | | |

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Faculty Name: - Sachin Lalar | | | | |
| **DATE** | **CLASS** | **Paper** | **TOPIC** | **REF. BOOKS** |
| 04/02/2015  Wednesday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Program Development and Production Environments | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Program Development and Production Environments | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 05/02/2015  Thursday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Software Portability, Programs as components | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Software Portability, Programs as components | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 06/02/2015  Friday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Quick and Dirty Programming | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Quick and Dirty Programming | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 07/02/2015  Saturday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | User Centric and System Centric | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | User Centric and System Centric | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 11/02/2015  Wednesday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Language Processors:  Types of Language Processors | Dhamdhere D.M, “System programming”, Tata McGraw Hill  Beck L. Leland, “System Software”, Pearson Education |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Language Processors:  Types of Language Processors | Dhamdhere D.M, “System programming”, Tata McGraw Hill  Beck L. Leland, “System Software”, Pearson Education |
| 12/02/2015  Thursday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Program Generation, Program Execution, Program  Translation and Interpretation | Dhamdhere D.M, “System programming”, Tata McGraw Hill  Beck L. Leland, “System Software”, Pearson Education |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Program Generation, Program Execution, Program  Translation and Interpretation | Dhamdhere D.M, “System programming”, Tata McGraw Hill  Beck L. Leland, “System Software”, Pearson Education |
| 13/02/2015  Friday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Fundamentals of Language Processing, Symbol Tables | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Fundamentals of Language Processing, Symbol Tables | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 18/02/2015  Wednesday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Assemblers: Elements of Assembly language  Programming | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Assemblers: Elements of Assembly language  Programming | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 19/02/2015  Thursday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Pass Structure of Assemblers | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Pass Structure of Assemblers | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 20/02/2015  Friday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Design of Two-pass assemble | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Design of Two-pass assemble | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 21/02/2015  Saturday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Intermediate code form | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Intermediate code form | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 25/02/2015  Wednesday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Program Listing and Error reporting | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Program Listing and Error reporting | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 26/02/2015  Thursday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Organizational and  Design issues in assemblers | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Organizational and  Design issues in assemblers | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 27/02/2015  Friday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Macros and Macro Preprocessors:  Macro Definition and Call, Macro expansion | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Macros and Macro Preprocessors:  Macro Definition and Call, Macro expansion | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
| 28/02/2015  Saturday | MCA 2nd Sem. (A) | System Programming (MCA-14-21) | Nested Macro calls,  Design of a Macro preprocessor | Dhamdhere D.M, “System programming”, Tata McGraw Hill |
|  | MCA 2nd Sem. (B) | System Programming (MCA-14-21) | Nested Macro calls,  Design of a Macro preprocessor | Dhamdhere D.M, “System programming”, Tata McGraw Hill |

|  |  |  |
| --- | --- | --- |
| CLASS: M.TECH (CSE) IInd Sem  PAPER: MT-CSE-14-22 (Digital Image Processing  **GIRDHAR GOPAL** | | |
| **DATE** | **TOPIC** | **REFERENCE BOOKS** |
| **2-02-2015** | Relationships between pixels, Neighborhood, Interpolation, Adjacency. | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **4-02-2015** | Image Enhancement: Intensity transformations and spatial filtering | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **5-02-2015** | Image Enhancement: Point and Mask based techniques | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **9-02-2015** | Image Enhancement: Histogram processing, Hitgram Matching, Histogram Equalisation | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **10-02-2015** | Fundamentals of spatial filtering, Smoothing and sharpening spatial filters | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **11-02-2015** | Filtering in frequency domain: Fourier Series and Transform | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **12-02-2015** | Discrete Fourier Transform, Frequency Domain Filtering Fundamentals | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **16-02-2015** | Frequency Domain Filtering Fundamentals, Homomorphic Filtering. | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **18-02-2015** | Color Image Processing**:** Color Fundamentals | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **19-02-2015** | Color characteristics, Color models, RGB, CYK, CMYK, HIS, YIQ models | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **23-02-2015** | Color characteristics, Color models, RGB, CYK, CMYK, HIS, YIQ models | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **24-02-2015** | Pseudo color image processing, full color image processing | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **25-02-2015** | color transformations | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| **26-02-2015** | Smoothening and sharpening of images. | * Gonzalez R.C., Woods R.E., “Digital Image Processing”, Pearson Education. * Jayaraman S., Esakkirajan S., Veerakumar T., “Digital Image Processing”, Tata McGraw Hill. |
| CLASS: MCA IVth Sem  PAPER: MCA-401 (Digital Image Processing | | |
| **DATE** | **TOPIC** | **REFERENCE BOOKS** |
| **6-02-2015** | Role of Information Architect, Collaboration and Communication | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **6-02-2015** | Organizing Web Site parameters, Navigation Systems | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **7-02-2015** | Designing Search Interface for web-site, Conceptual Design | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **7-02-2015** | High-Level Design, Architectural Page Mockups, Design Sketches | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **13-02-2015** | good & bad web design, Process of Web Publishing, | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **13-02-2015** | Phases of Web Site development, enhancing your web-site, web security. | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **20-02-2015** | HTML Basic Concepts, Static and dynamic HTML, Structure of HTML documents, HTML Elements, Linking in HTML | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **20-02-2015** | Anchor Attributes, Image Maps, Meta Information, Image Preliminaries, Layouts, Backgrounds, Colors and Text, Fonts, Tables, | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **21-02-2015** | Frames and layers, Audio and Video Support with HTML, | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **21-02-2015** | Frames and layers, Audio and Video Support with HTML, | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **27-02-2015** | Database integration with HTML, | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **27-02-2015** | CSS, Positioning with Style sheets | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **28-02-2015** | Forms Control, Form Elements. | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |
| **28-02-2015** | Forms Control, Form Elements. | * H.M. Deitel, P.J. Deitel, A.B. Goldberg, Internet & World Wide Web How to Program, Pearson education * Uttam K. Roy, Web Engineering, Oxford Publishing House |

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Mr. Ishan Jawa | | | | |
| **Date** | **Class** | **Paper** | **Topic** | **Reference Book** |
| 2/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MCA- 14-14) | Introduction to Algorithms | Fundamentals of Computer Algorithms by Sartaj Sahni |
| MSC. 1st | Programming Languages (MS-25) | Finite Automaton | Programming Languages by Louden |
| 3/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Analyzing Algorithms: Space Complexity | Fundamentals of Computer Algorithms by Sartaj Sahni |
|  | M.Sc 1st | Programming Languages(MS-25) | Languages accepted by FA | Programming Languages by Louden |
| 4/02/2014 | MSC. 1st | Design and Analysis of Algorithms(MS-24) | Analyzing Algorithms: Time Complexity | Fundamentals of Computer Algorithms by Sartaj Sahni |
|  | MSC. 1st | Programming Languages (MS-25) | Non-determinism | Fundamentals of Computer Algorithms by Sartaj Sahni |
| 5/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Recursive Algorithms | Fundamentals of Computer Algorithms by Sartaj Sahni |
|  | MSC. 1st | Programming Languages (MS-25) | Pushdown Automata | Fundamentals of Computer Algorithms by Sartaj Sahni |
| 9/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Arrays, Lists | Fundamentals of Algorithms by Neapolitan |
|  | M.Sc 1st | Programming Languages(MS-25) | Types of PDA | Programming Languages by Robert Sebesta |
| 10/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Stacks,Queues, Binary Trees | Fundamentals of Computer Algorithms by Sartaj Sahni |
| M.Sc 1st | Programming Languages (MS- 25) | Need of Formal Computational Models | Programming Languages by Louden |

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| 11/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Heaps, Priority Queues | Fundamentals of Computer Algorithms by Sartaj Sahni |
| MSC. 1st | Programming Languages (MSC- 25) | Chomsky Hierarchy | Programming Languages by Louden |
| 12/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Graphs: Introduction | Fundamentals of Computer Algorithms by Sartaj Sahni |
|  | M.Sc 1st | Programming Languages(MS-25) | Classes and Objects | Programming Languages by Louden |
| 16/02/2014 | MSC. 1st | Design and Analysis of Algorithms(MS-24) | BFS, DFS | Fundamentals of Computer Algorithms by Sartaj Sahni |
|  | MSC. 1st | Programming Languages (MS-25) | Abstraction, Encapsulation, Information Hiding | Fundamentals of Computer Algorithms by Sartaj Sahni |
| 17/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Minimum Spanning Trees | Fundamentals of Computer Algorithms by Sartaj Sahni |
|  | MSC. 1st | Programming Languages (MS-25) | Generalization and inheritence | Fundamentals of Computer Algorithms by Sartaj Sahni |
| 18/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Recurrence relations: Formation and Types | Fundamentals of Algorithms by Neapolitan |
|  | M.Sc 1st | Programming Languages(MS-25) | Aggregation, Functions | Programming Languages by Robert Sebesta |
| 19/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Solving Recurrences | Fundamentals of Computer Algorithms by Sartaj Sahni |
| M.Sc 1st | Programming Languages (MSC- 25) | Polymorphism and Abstract Classes | Programming Languages by Louden |
| 23/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Program Verification and Testing | Fundamentals of Computer Algorithms by Sartaj Sahni |
| MSC. 1st | Programming Languages (MSC- 25) | Container Classes | Programming Languages by Louden |
| 24/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Structured Design Methodology | Fundamentals of Computer Algorithms by Sartaj Sahni |
|  | M.Sc 1st | Programming Languages(MS-25) | Languages Paradigms | Programming Languages by Louden |
| 25/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Searching Techniques | Fundamentals of Computer Algorithms by Sartaj Sahni |
|  | MSC. 1st | Programming Languages (MS-25) | Language design tradeoffs | Fundamentals of Computer Algorithms by Sartaj Sahni |
| 26/02/2014 | MSC. 1st | Design and Analysis of Algorithms (MS-24) | Selection Sort, Bubble Sort | Fundamentals of Computer Algorithms by Sartaj Sahni |
| M.Sc 1st | Programming Languages (MSC- 25) | Type Checking and Scopes | Programming Languages by Louden |

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **FACULTY NAME : VINOD KUMAR** | | | | |
| **DATE** | **CLASS** | **SUBJECT** | **TOPICS** |  |
| 02/2/2015  Monday | M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | UNIT–I: Introduction: Goals |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | UNIT-I: Introduction:  Background and history, Overview of AI applications areas |  |
| 04/2/2015  Wednesday | M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Distribution Transparency |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | The predicate calculus: Syntax  and semantic for propositional logic |  |
| 05/2/2015  Thursday | M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Types of Distributed Systems,  Architectural styles |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | FOPL, Clausal form, inference  rules, resolution and unification |  |
| 09/2/2015  Monday | M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | System Architecture:  Centralized, Decentralized |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | Knowledge representation :  Network representation |  |
| 10/2/2015  Tuesday | M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Hybrid Architecture versus  Middleware |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | Associative network &  conceptual graphs |  |
| 11/2/2015  Wednesday | M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Process: Process, Threads,  Threads in distributed systems, Virtualization |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | Structured representation :  Frames & Scripts |  |
| 12/2/2015  Thursday | M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Clients, Servers, Server clusters,  Code migration |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | UNIT-II : Search strategies:  Strategies for state space search |  |
| 16/2/2015  Monday | M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Communication and Naming:  Types of communication |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | Data driven and goal driven  search; Search algorithms |  |
| 18/2/2015  Wednesday | M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Remote procedure calls |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | Uninformed Search : Depth First  Search |  |
| 19/2/2015  Thursday | M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Message-oriented and stream  oriented communication |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | Uninformed Search : Breadth  First Search |  |
| CLASS | SUBJECT | TOPICS |  |
| M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Multicast communication,  names, identifiers |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | Uninformed search : Depth  First with iterative deepening |  |
| M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Addresses, naming techniques,  attribute based naming |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | Informed search : Hill climbing  algorithm |  |
| M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | UNIT–II: Synchronization: Clock synchronization |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | Informed search : Best First  Algorithm |  |
| M.Tech.  2nd Sem. | Distributed Systems  [MT-CSE-14-24(i)] | Global positioning system,  logical clocks, vector clocks |  |
| MCA  4th Sem. | Artificial Intelligence  [MCA-405(iii)] | Informed search : A\* Algorithm,  Mini-Max etc. |  |