

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

Course Outcomes (IV CSE) I Semester ACY: 2022-23 Regulation :: R19		
INTERNET OF THINGS(19A05701T)		
No	Course Outcome	Taxonomy
C411.1	Choose the Sensors and Actuators for an IOT application.	Analyse
C411.2	Interpret the design principles that govern connected devices.	Understand
C411.3	Develop simple application using Raspberry pi and arduino.	Apply
C411.4	Evaluate and develop a solution for a given application using APIs	Analyse
C411.5	Build the business model in an IOT application	Understand
C411.6	Interpret the manufacturing techniques	Understand
SOFTWARE TESTING(19A05702T)		
No	Course Outcome	Taxonomy
C412.1	Understand the basic testing procedures	Understand
C412.2	List transaction flows, data flow testing, their techniques and implementation comments in software testing	Remember
C412.3	Understand domains and interface testing and their testability tips.	Understand
C412.4	develop paths, regular expressions and logic-based testing	Create
C412.5	Design and implement state graph, state testing, good state graph, bad state graph and their testability tips	Create
C412.6	Describe graph matrices, matrix properties and node reduction algorithm	Understand
CLOUD COMPUTING(19A05703a)		
No	Course Outcome	Taxonomy
C413.1	Understand Cloud Computing characteristics, models and different technologies in cloud Computing	Understand
C413.2	Differentiate various Cloud Computing Services	Apply
C413.3	Identify multiple Cloud Application design methodologies	Remember
C413.4	Apply Python language for accessing different cloud services	Apply
C413.5	Analyze Cloud Application Development in Python	Analyze
C413.6	Compare various Cloud Computing Applications	Analyze
BASICS OF CIVIL ENGINEERING(19A01704b)		
No	Course Outcome	Taxonomy
C414.1	Identify the traditional materials that are used for building constructions.	Understand
C414.2	Draw the plans of the buildings based on the principles of building planning.	Remember
C414.3	Know the importance of the building bye-laws.	Remember
C414.4	Identify the sources of dampness and its ill effects on buildings and its prevention.	Understand
C414.5	Know the cost-effective construction in mass housing schemes.	Understand
C414.6	Know the importance of surveying in planning of the buildings.	Understand
MANAGEMENT SCIENCE(19A52701b)		
No	Course Outcome	Taxonomy
C415.1	Explain the basic concepts of management in modern contexts.	Understand
C415.2	Define organization structures and principles.	Analyze
C415.3	Demonstrate production and marketing aspects.	Apply
C415.4	Outline the roles and responsibilities of Human Resource Manager.	Apply

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

C415.5	Prepare strategies in the modern management.	Create
C415.6	Describe the modern management practices based on the requirement of the projects.	Understand
SOFTWARE TESTING LAB(19A05702P)		
No	Course Outcome	Taxonomy
C416.1	Demonstrate the basic testing procedures	Understand
C416.2	Describe the bug tracking in testing	Understand
C416.3	Apply testing using Win runner tool	Apply
C416.4	Analyze the Selenium and Bugzilla tools to perform testing	Apply
C416.5	formulate test cases and test suites	Create
C416.6	Construct and test simple programs.	Create
Internet of Things Lab(19A05701P)		
No	Course Outcome	Taxonomy
C417.1	Choose the Sensors and Actuators for an IOT application.	Remember
C417.2	Develop simple applications using raspberry pi and Arduino.	Apply
C417.3	Select protocols for a specific IOT application	Remember
C417.4	Experiment with embedded boards for creating IOT prototyping	Apply
C417.5	formulate test cases and test suites, Utilize the Cloud platform and APIs for an IOT application	Apply
C417.6	Design a solution for a given IOT application	Create
Industrial Training And Skill Development (19A05705)		
C418.1	Describe tools and technologies encountered during industrial training	Remember
C418.2	Understanding the process of using tools and techniques for solving real time problems	Understand
C418.3	Participate in the real time projects as team member or individual in industrial training.	Apply
C418.4	Applying engineering knowledge and technical skills in real time Project	Apply
C418.5	Develop Communication, Interpersonal and Technical skills needed for placement	Apply
C418.6	Build professional work reports and presentations.	Apply

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

Course Outcomes (IV CSE) II Semester ACY: 2022-23		Regulation :: R19
DevOps (19A05801a)		
No	Course Outcome	Apply
C421.1	Apply the Software Development life cycle process for different Software's Development and IT operations.	Apply
C421.2	Illustrate the DevOps Orchestration and DevOps delivery pipeline	Apply
C421.3	Demonstrate the DevOps Technologies and Tool stack implementation for different software projects.	Apply
C421.4	Demonstrate continuous development and deployment, automation of configuration management, inter-team collaboration, and IT service agility.	Analyse
C421.5	Analyze the DevOps Maturity Model and Assessment.	Apply
C421.6	Demonstrate the DevOps in real time projects.	Apply
Disaster Management (19A01802a)		
No	Course Outcome	Taxonomy
C422.1	To know about the natural hazards and its management	Understand
C422.2	To know about the fire hazards and solid waste management	Understand
C422.3	To know about the regulations of building codes and land use planning related to risk and vulnerability	Remember
C422.4	To know about the technological aspects of disaster management	Apply
C422.5	To understand about the factors for disaster reduction	Understand
C422.6	To impart the education related to risk reduction in schools and communities	Apply
Project Work (19A05803)		
No	Course Outcome	Taxonomy
C423.1	Identify the problem of Social/Industrial relevance to be solved	Understand
C423.2	Summarize the existing technology, its merits and demerits used to solve the problem	Analyse
C423.3	Design the appropriate solution using the sophisticated hardware and/or software	CREATE
C423.4	Compare the results of the proposed solution with the existing solution	EVALUATE
C423.5	Demonstrate the project along with the complete documentation report of the project	EVALUATE
C423.6	Show the interpersonal, professional and work with team skills	APPLY

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

III-CSE I Semester ACY: 2022-23 Regulation ::R20		
Computer Networks(20A05501T)		
No	Course Outcome	Taxonomy
C311.1	Illustrate Hardware, Software Components, Parameters of a Network, which are used to find efficiency of network.	Analyse
C311.2	Explain Design Issues and Services of Data Link Layer	Understand
C311.3	Apply various Error Detection and Correction Techniques used for data transmission in real time Applications.	Apply
C311.4	Classify routing protocols and analyse how to assign IP addresses for given Network	Analyse
C311.5	Describe Transport Layer Design Issues and Protocols of Transport Layer.	Understand
C311.6	Describe Application Layer Design Issues and Protocols of Application Layer.	Understand
Artificial Intelligence(20A05502T)		
No	Course Outcome	Taxonomy
C312.1	Design Intelligent Agents.	Create
C312.2	Apply searching techniques for solving a problem.	Apply
C312.3	Develop Natural Language Interface for Machines.	Create
C312.4	Implementing programs that translate from one language to another language.	Apply
C312.5	Explain the techniques that provide robust object recognition in restricted context.	Understand
C312.6	Design mini robots.	Create
Formal Languages and Automata Theory (20A05503)		
No	Course Outcome	Taxonomy
C313.1	Enumerate the basic properties of deterministic and nondeterministic finite automata and also compare Moore and Mealy Machines.	Remember
C313.2	Interpret the basic concepts of Regular expressions, regular languages and pumping lemma for Regular Languages.	Understand
C313.3	Demonstrate context free grammar for various languages, normal forms and pumping lemma for CFL's	Apply
C313.4	Interpret and design different types of PDA and also explain the relationship among language classes and grammars with the help of Chomsky Hierarchy	Understand
C313.5	Solve the computational model using Turing Machine and variations of Turing machine.	Apply
C313.6	Examine the concepts of decidable and undecidable problems	Apply
Big Data Technologies (20A05504c)		
No	Course Outcome	Taxonomy
C314.1	Understand the elements of Big Data	Understand
C314.2	Use different technologies to tame Big Data	Apply
C314.3	Using Map Reduce and HBase to process given data	Apply
C314.4	Implementing Map Reduce Program and Customizing Map Reduce Execution	Apply

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

C314.5	Testing and Debugging Map Reduce Application	Analyze
C314.6	Develop applications using Hive and NoSQL	Apply
3D Printing Technology(20A03505)		
No	Course Outcome	Taxonomy
C315.1	Introduction of 3D- printing and various techniques for processing of CAD models for rapid prototyping .	Understand
C315.2	Understand and apply fundamentals of rapid prototyping techniques.	Understand
C315.3	Use appropriate tooling for rapid prototyping process.	Apply
C315.4	Use rapid prototyping techniques for reverse engineering.	Apply
C315.5	Identify various pre-processing, processing and post processing errors in RP processes.	Understand
C315.6	Applications of rapid prototype in different sections.	Apply
Computer Networks Lab (20A05501P)		
No	Course Outcome	Taxonomy
C316.1	Explain the different types of networks.	Understand
C316.2	Describe the software and hardware components of a network	Understand
C316.3	Explain the working of networking commands supported by operating system	Understand
C316.4	Design the Network simulator 2/3	Create
C316.5	Develop the use of networking functionality supported by JAVA	Apply
C316.6	Apply with computer networking tools.	Apply
Artificial Intelligence Lab (20A04304P)		
No	Course Outcome	Taxonomy
C317.1	Implement searching algorithms for solving a given problem.	Create
C317.2	Build Intelligent Agents and Chatbots.	Apply
C317.3	Develop Natural Language Interface for Machines.	Create
C317.4	Implementing programs that translates from one language to another language.	Apply
C317.5	Design Chatbot and virtual assistant	Create
C317.6	Design mini robots.	Create
Advanced Web Application Development (20A05506)		
No	Course Outcome	Taxonomy
C318.1	Install XAMPP/WAMP and Develop a Student Database	Apply
C318.2	Develop dynamic websites using PHP and MySQL	Apply
C318.3	Handle Authentication using Sessions, JWT.	Apply
C318.4	Secure Web applications from common attacks like Injection, XSS.	Apply
C318.5	Integrate Libraries to dynamically generate documents, spreadsheets, PDFs, etc.	Apply
C318.6	Host Websites in traditional web hosting platforms and also Cloud based infrastructure	Apply
Evaluation of Community Service Project(20A05507)		
No	Course Outcome	Taxonomy
C319.1	To enhance comprehension of the challenges faced by vulnerable and marginalized segments of society	Understand
C319.2	To initiate team processes with the student groups for societal change.	Analyse
C319.3	To provide students an opportunity to familiarize themselves with urban /rural community they live in.	Create
C319.4	To enable students to engage in the development of the community.	Evaluate



GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

C319.5	To plan activities based on the focused groups.	Evaluate
C319.6	To know the ways of transforming the society through systematic programme implementation	Apply

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

III-CSE-II SEMESTER ACY: 2022-23 Regulations::R20		
COMPILER DESIGN (20A05601T)		
No	Course Outcome	Taxonomy
C321.1	Discuss the major phases of compilers and use the knowledge of the Lex tool.	Understand
C321.2	Develop the parsers and experiment with the knowledge of different parsers design.	Apply
C321.3	Describe intermediate code representations using syntax trees and DAG's as well as use this knowledge to generate intermediate code.	Understand
C321.4	Classify various storage allocation strategies.	Analyze
C321.5	Examine the design issues of code generator and generate machine code from the source code of a language.	Analyze
C321.6	Summarize various optimization techniques and Implement these in dataflow analysis.	Evaluate
MACHINE LEARNING (20A05602T)		
No	Course Outcome	Taxonomy
C322.1	Understand machine learning techniques to solve the given problem.	Understand
C322.2	Understand various aspects of model selection and feature engineering.	Understand
C322.3	Solve the classification problems using various machine learning techniques.	Apply
C322.4	Analyse the performance of different regression techniques on various types of data sets.	Analyze
C322.5	Analyse the performance of various clustering techniques to deal with unlabelled data.	Analyze
C322.6	Apply the principle of Apriori algorithm on real-time data sets to find frequent patterns.	Apply
INTERNET OF THINGS(20A05603T)		
No	Course Outcome	Taxonomy
C323.1	Interpret the design principles that govern connected devices	Understand
C323.2	Develop simple applications using Raspberry Pi and Arduino.	Apply
C323.3	Analyse various types of M2M communication protocols and IOT architectures.	Analyse
C323.4	Illustrate and develop a solution for a given application using APIs	Understand
C323.5	Distinguish various types of manufacturing techniques and storage models in IOT.	Analyse
C323.6	Demonstrate various IOT solutions using sensors, actuators and devices.	Understand
SOFTWARE TESTING (20A05604A)		
No	Course Outcome	Taxonomy

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES**Academic Year: 2022-23**

C324.1	Interpret the basic concepts of software testing and its essentials.	Understand
C324.2	Identify Transaction Flows, Transaction Flow Testing Technique and Strategies in Dataflow Testing.	Apply
C324.3	Develop test techniques for domain and interface testing.	Apply
C324.4	Develop paths, regular expressions and logic-based testing.	Apply
C324.5	Analyze the state, implement state graph and state testing,	Analyze
C324.6	Develop graph matrices and Node Reduction Algorithm, Building Tools .	Apply

BASIC VLSI DESIGN (20A04606)

No	Course Outcome	Taxonomy
C325.1	Explain the MOS fabrication flow and Design layers used in the process sequence	Understand
C325.2	Explain the Basic Electrical Properties of MOS and Bi-CMOS Circuits	Understand
C325.3	Estimate the sheet resistance, square capacitance, propagation delays inverter delays in MOS circuits	Understand
C325.4	Apply the design Rules to draw the Stick diagrams and layout of a given MOS circuits	Apply
C325.5	Analyze the behaviour of static and dynamic logic circuits	Analyze
C325.6	Select the various CAD tools for Design and Simulation in to the Practical aspects and testability.	Analyze

COMPILER DESIGN (20A05601P)

No	Course Outcome	Taxonomy
C326.1	Design and implement fundamental concepts of finite Automata	Apply
C326.2	Design and implement a lexical analyzer for given language	Apply
C326.3	Use LEX and YACC tools for developing a scanner and a parser	Apply
C326.4	Design and implement LL and LR parsers	Apply
C326.5	Design algorithms to perform code optimization in order to improve the performance of program	Apply
C326.6	Design and implement code generation for given expression.	Apply

MACHINE LEARNING (20A05602P)

No	Course Outcome	Taxonomy
C327.1	Understand the Mathematical and statistical perspectives of machine learning algorithms through python programming.	Understand
C327.2	Apply the basics of learning problems with hypothesis and version spaces	Apply

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES**Academic Year: 2022-23**

C327.3	Apply appropriate datasets to the classification techniques	Apply
C327.4	Apply clustering techniques to deal with unlabelled data for correct predictions	Apply
C327.5	Use visualization tool to deal with regression-based algorithms.	Apply
C327.6	Experiment End – to – End machine learning systems.	Apply
INTERNET OF THINGS (20A05603P)		
No	Course Outcome	Taxonomy
C328.1	Choose the Sensors and Actuators for an IOT application	Remember
C328.2	Develop simple applications using raspberry pi and Arduino.	Apply
C328.3	Select protocols for a specific IOT application	Remember
C328.4	Experiment with embedded boards for creating IOT prototyping	Apply
C328.5	Utilize the Cloud platform and APIs for an IOT application	Apply
C328.6	Build a solution for a given IOT application	Apply
SOFT SKILLS (20A52401)		
No	Course Outcome	Taxonomy
C329.1	Memorize various elements of effective communicative skills	Understand
C329.2	Interpret people at the emotional level through emotional intelligence	Understand
C329.3	Apply critical thinking skills in problem solving	Apply
C329.4	Analyze the needs of an organization for team building	Analyze
C329.5	Judge the situation and take necessary decisions as a leader	Analyze
C329.6	Develop social and work- life skills as well as personal and emotional well-being	Analyze
INTELLECTUAL PROPERTY RIGHTS AND LAW (20A99601)		
No	Course Outcome	Taxonomy
C3210.1	Use intellectual property rights for product development	Apply
C3210.2	Illustrate Rights Afforded by Copyright Law	Apply
C3210.3	Illustrate the Patent Infringement and Litigation	Apply
C3210.4	Apply Trade Mark registration process and maintenance	Apply
C3210.5	Demonstrate the trade secret law implantation for developing a product.	Apply
C3210.6	Use the concepts of Cyber Law implantation for developing a product	Apply

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

II-CSE-I SEMESTER ACY: 2022-23 Regulations::R20		
Discrete Mathematics & Graph Theory (20A54304)		
No	Course Outcome	Taxonomy
C211.1	Apply basic logic statements using truth tables and properties of logic and find the PCNF and PDNF	Apply
C211.2	Describe the properties of sets ,functions	Understand
C211.3	Describe the properties of algebraic structures	Understand
C211.4	Apply the fundamental principle of counting and identify the relationship between permutation and combination	Apply
C211.5	Determine the recurrence relation using generating functions	Apply
C211.6	Understand the concepts of graphs and Apply the concepts of functions to identify the isomorphic graphs ,DFS,BFS and spanning trees	Apply
Digital Electronics& Microprocessors(20A04304T)		
No	Course Outcome	Taxonomy
C212.1	Differentiate various number systems, binary codes	Understand
C212.2	Solve the Boolean Expressions using Boolean algebra and k-maps.	Apply
C212.3	Implement different combinational and Sequential circuits.	Apply
C212.4	Explain the internal architecture and organization of the 8086 microprocessor.	Understand
C212.5	Demonstrate the assembly level language programming for 8086 and 8051	Apply
C212.6	Describe the architecture, hardware details and memory organization of 8051 microcontroller.	Understand
Advanced Data Structures & Algorithms(20A05301T)		
No	Course Outcome	Taxonomy
C213.1	Analyze the complexity of algorithms and apply asymptotic notations.	Analyse
C213.2	Illustrate the concepts of Binary Search Trees, AVL Trees and B Trees	Analyse
C213.3	Illustrate the concepts of Red Black Trees, Splay Trees and Hashing.	Analyse
C213.4	Develop Divide & Conquer , Greedy Method algorithms for various real-time applications. .	Apply
C213.5	Develop dynamic programming and Backtracking algorithms for various real-time applications.	Apply
C213.6	Interpret the concepts of NP-Hard and NP-Complete problems	Analyse
Object Oriented Programming Through Java(20A05302T)		
No	Course Outcome	Taxonomy



GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

C214.1	Understand the syntax, semantics of Java Programming Language and apply object oriented programming principles to real world problems	Understand
C214.2	Apply code reusability through inheritance, packages and interfaces	Apply
C214.3	Develop User defined Exceptions in real world problems	Apply
C214.4	Develop applications by using parallel streams for better performance	Apply
C214.5	Use multithreading and collection framework for real world problems	Apply
C214.6	Build GUI using applets, swings and access the database using JDBC	Apply
Computer Organization(20A05303)		
No	Course Outcome	Taxonomy
C215.1	Describe the fundamental organisation of a computer system.	Understand
C215.2	Explain addressing modes, instruction formats and program control statements	Understand
C215.3	Demonstrate Arithmetic Operations on signed and unsigned numbers and design of Control Unit.	Apply
C215.4	Differentiate about types of Memory.	Analyse
C215.5	Describe the basic Concepts of Input/Output devices.	Understand
C215.6	Explain fundamental Concepts of Pipelining and Large Computer System.	Understand
Digital Electronics& Microprocessors Lab (20A04304P)		
No	Course Outcome	Taxonomy
C216.1	Verify Logic circuit using basic concepts of Boolean Algebra.	Understand
C216.2	Design any Logic circuit using basic concepts of PLDs.	Evaluate
C216.3	Design any Logic circuit using basic concepts of PAL	Create
C216.4	Design any Logic circuit using basic concepts of PLA	Create
C216.5	Implementation of 8086 Microprocessor.	Remember
C216.6	Development of 8051 Microcontroller	Create
Advanced Data Structures and Algorithms Lab (20A05301P)		
No	Course Outcome	Taxonomy
C217.1	Appropriately use non-linear data structure operations for a given problem	Apply
C217.2	Implement appropriate sorting/searching technique for solving a given problem	Apply
C217.3	Develop divide and conquer algorithms to solve various computing problems.	Apply
C217.4	Demonstrate different greedy method algorithms to solve problem	Apply
C217.5	Develop Back Tracking algorithms to solve real world problem	Apply

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

C217.6	Illustrate dynamic programming algorithms for various real-time applications	Apply
Object Oriented Programming Through Java Lab(20A05302P)		
No	Course Outcome	Taxonomy
C218.1	Demonstrate the installation and usage of java software	Apply
C218.2	Illustrate the programming constructs in java	Apply
C218.3	Demonstrate the Object oriented concepts in java	Apply
C218.4	Demonstrate the concepts of Exception Handling and Multithreading in java	Apply
C218.5	Illustrate the concept of Files in java	Apply
C218.6	Illustrate the usage of AWT , Swings and JDBC	Apply
Web application Development(20A05304)		
No	Course Outcome	Taxonomy
C219.1	Construct web sites with valid HTML, CSS, JavaScript	Apply
C219.2	Create responsive Web designs that work on phones, tablets, or traditional laptop and wide- screen monitors	Apply
C219.3	Develop websites using jQuery to provide interactivity and engaging user experiences	Apply
C219.4	Understand the HTTP & Browser Developer Tools & Developer Tools	Understand
C219.5	Embed Google chart tools in a website for better visualization of data	Apply
C219.6	Design and develop web applications using Content Management Systems like Word Press	Apply
Environmental Science(20A99201)		
No	Course Outcome	Taxonomy
C2110.1	Gain the knowledge about environment , natural resources and different techniques involved in its conservation.	Understand
C2110.2	Get the information about different eco-systems and its functions	Understand
C2110.3	Recognize the types of bio-diversity along with values and conservation methods.	Analyse
C2110.4	Gain the knowledge about various environmental pollutions and able to design the environmental friendly process in engineering.	Apply
C2110.5	Gain the knowledge about sustainable development concept and practice it in life, society and Industry.	Apply
C2110.6	Understand the both impacts of population growth on environment and needed measures to protect the environment .	Understand

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

II-CSE-II SEMESTER ACY: 2022-23 Regulations::R20		
Deterministic & Stochastic Statistical Methods(20A54404)		
No	Course Outcome	Taxonomy
C221.1	Apply logical thinking to problem- solving in context	APPLY
C221.2	Employ methods related to these concepts in a variety of data science application	Apply
C221.3	Use appropriate technology to aid problem solving and data analysis	Apply
C221.4	The bayesian process of inference in probabilistic reasoning system.	Understand
C221.5	Demonstrate skills in unconstrained optimization	Apply
C221.1	Apply logical thinking to problem- solving in context	APPLY
Database Management Systems(20A05401T)		
No	Course Outcome	Taxonomy
C222.1	Interpret the basic concepts of Database Management system and Relational Database Model	Understand
C222.2	Apply the concepts of SQL and PL/SQL to real world problems	Apply
C222.3	Design a database using E-R Model	Apply
C222.4	Apply different normal forms to design the database	Apply
C222.5	Interpret the concepts of Query Processing and Optimization	Understand
C222.6	Induct knowledge on transactions and concurrency control techniques	Understand
Operating Systems(20A05402T)		
No	Course Outcome	Taxonomy
C223.1	Explain the role of Operating System, its functions and types	Understand
C223.2	Illustrate the concepts of process, Multi processing, Thread and Multi threading.	Apply
C223.3	Compare the performance of various CPU scheduling algorithms	Analyse
C223.4	Outline different ways to handle the deadlocks and process synchronization	Apply
C223.5	Compare and contrast various memory management techniques	Analyse
C223.6	Describe the concepts of File system, I/O management, protection and security	Understand
Software Engineering(20A05403T)		
No	Course Outcome	Taxonomy
C224.1	Illustrate the different software process models and able to categorize the types of soft wares	Apply
C224.2	Use the requirements analysis and specification for software development	Apply

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

C224.3	Sketch Software Design for product implementation.	Apply
C224.4	Apply Coding guidelines for conventional and object oriented programming.	Apply
C224.5	Apply Testing guidelines for conventional and object oriented programming.	Apply
C224.6	Use various non functional requirements for design and development of product or process.	Apply
Managerial Economics & Financial Analysis(20A52301)		
No	Course Outcome	Taxonomy
C225.1	Explain the role and responsibilities of a managerial economist in modern business scenario	Understand
C225.2	Apply the demand of a product by using demand forecasting methods.	Apply
C225.3	Calculate the Break Even Point (BEP) with the help of production and cost analysis.	Apply
C225.4	Explain their learnings about competitive markets and business economic environment.	Understand
C225.5	Apply the process of selection of investment alternatives using different appraisal methods.	Apply
C225.6	Examine the process of preparing financial statements to know financial position of the firm.	Analyse
Database Management SystemsLab(20A05401P)		
No	Course Outcome	Taxonomy
C226.1	Implement the commands of DDL, DML, DCL, TCL and DQL.	Apply
C226.2	Implement queries involving Joins, Set Operations, Aggregate functions and Strings	Apply
C226.3	Implement programs on PL/SQL	Apply
C226.4	Implement Procedures, Functions, Cursors and Triggers using PL/SQL	Apply
C226.5	Construct E-R Model for different database applications	Apply
C226.6	Implement a Database for real world application	Apply
Operating SystemsLab(20A05402P)		
No	Course Outcome	Taxonomy
C227.1	Demonstrate UNIX commands	Apply
C227.2	Illustrate the concepts of process, multiprocessing, thread, and multithreading, shared memory.	Apply
C227.3	Implement interprocess communication between two processes.	Apply
C227.4	Illustrate the concepts of memory management	Apply
C227.5	Implement Bankers Algorithms to Avoid and prevent the Dead Lock	Apply
C227.6	Illustrate the file organization techniques	Apply

**GEETHANJALI INSTITUTE OF SCIENCE & TECHNOLOGY::NELLORE**

Department of Computer Science and Engineering

COURSE OUTCOMES

Academic Year: 2022-23

Software Engineering Lab(20A05403P)		
No	Course Outcome	Taxonomy
C228.1	Illustrate the different software process models and able to categorize the types of soft wares	Apply
C228.2	Use the requirements analysis and specification for software development	Apply
C228.3	Sketch Software Design for product implementation	Apply
C228.4	Apply Coding guidelines for conventional and object oriented programming.	Apply
C228.5	Apply Testing guidelines for conventional and object oriented programming.	Apply
C228.6	Use various non functional requirements for design and development of product c process.	Apply
Exploratory Data Analysis with R(20A05404)		
No	Course Outcome	Taxonomy
C229.1	Demonstrate the Installation of R and Plotting data in R	Apply
C229.2	Illustrate the Shape Of Data and Probability Distributions in R	Apply
C229.3	Analyse Exploratory Data Analysis And Testing Hypotheses in R	Analyse
C229.4	Describe Predicting Continuous Variables and Correlation in R	Understand
C229.5	Demonstration on a Statistical Model for a Linear Relationship in R	Apply
C229.6	Apply Type Functions And Statistical Functions In R	Apply
Design Thinking for Innovation (20A99401)		
No	Course Outcome	Taxonomy
C2110.1	Explain about Design and Process of Product Development.	Understand
C2110.2	Describe about benefits,Principles,innovation and various design ideas	Understand
C2110.3	Identify the Idea generation techniques and methods used for Product development	Remember
C2110.4	Explain the design thinking process in IT and Agile software development.	Understand
C2110.5	Use TILES toolkit and cloud implementation for Design thinking activities in IT.	Apply
C2110.6	Describe about design techniques related to Variety of Software services.	Understand