Don Bosco College(Co-Ed)
Yelagiri Hills
PG Department of Computer Science
Course Outcomes for 2022 Curriculum

SEM I	RELATIONAL DATABASE MANAGEMENT SYSTEM

Course Outcomes

1. After studied unit-1, Students are able to have a broad understanding of database concepts and database management system software

2. After studied unit-2, Students are able to have a high-level understanding of major DBMS components and their function

3. After studied unit-3, Students are able to know the various normalization techniques.

4. After studied unit-4, Students are able to write SQL commands to create tables and indexes, insert/update/delete data, and query data in a relational DBMS

5. After studied unit-5, Students are able to understand the PL/SQL and Stored Procedures.

SEM I	ENTERPRISE JAVA PROGRAMMING

Course Outcomes

1. After studied unit-1, Students are able to understand about applets concepts.

2. After studied unit-2, Students are able to understand java networking system.

3. After studied unit-3, Students are able to understand about collections and design patterns.

4. After studied unit-4, Students are able to develop applications using JSP. 5.

5. After studied unit-5, Students are able to concept of web programming

SEM I	PROGRAMMING USING C#.NET

Course Outcomes

1. After studied unit-1, Students are able to understand about introduction of C#.NET.

2. After studied unit-2, Students are able to understand what is mean by windows forms.

3. After studied unit-3, Students are able to understand about delegates and events.

4. After studied unit-4, Students are able to understand reflection and remoting.

5. After studied unit-5, Students are able to understand about database in C#.NET.

SEM I	RELATIONAL DATABASE MANAGEMENT SYSTEM LAB

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SEM I	COMPUTER ORGANIZATION

Course Outcomes

1. After studied unit-1, Students are able to understand about Organization and design concepts

2. After studied unit-2, Students are able to describe the translation model of assembly language to machine language.

3. After studied unit-3, Students are able to understand about Micro program control concepts.

4. After studied unit-4, Students are able to understand central processor unit.

5. After studied unit-5, Students are able to understand about pipeline and vector processing concepts.

SEM I	PARALLEL COMPUTING

Course Outcomes

1. After studied unit-1, Students are able to understand about Scalability and clustering concepts.

2. After studied unit-2, Students are able to understand about enabling technologies.

3. After studied unit-3, Students are able to understand interconnections of systems.

4. After studied unit-4, Students are able to understand Parallel Programming.

5. After studied unit-5, Students are able to understand about Message Passing Programming.

SEM I	E-COMMERCE

Course Outcomes

1. After studied unit-1, Students are able to understand fundamentals of E-Commerce.

2. After studied unit-2, Students are able to understand about E-Procurement.

3. After studied unit-3, Students are able to understand about Customer relationship management.

4. After studied unit-4, Students are able to understand about M-Commerce.

5. After studied unit-5, Students are able to understand about Management of mobile commerce services

SEM I	INTRODUCTION TO COMPUTER APPLICATIONS

Course Outcomes

1. After studied unit-1, Students are able to know about computer.

2. After studied unit-2, Students are able to operate computer using GUI based Operating system.

3. After studied unit-3, Students are able to understand about word processing.

4. After studied unit-4, Students are able to understand about spread sheet.

5. After studied unit-5, Students are able to understand about making PPT presentation.

SEM I	PRINCIPLES OF INTERNET

Course Outcomes

1. After studied unit-1, Students are able to understand about what is internet

2. After studied unit-2, Students are able to learn about connecting to the internet.

3. After studied unit-1, Students are able to understand about world wide web.

4. After studied unit-2, Students are able to learn about multimedia on the internet.

5. After studied unit-1, Students are able to understand about safeguarding the internet.

SEM II	ADVANCED ENTERPRISE JAVA PROGRAMMING

Course Outcomes

1. After studied unit-1, Students are able to work with JSP, JSF and Servlet using MVC approach.

2. After studied unit-2, Students are able to develop the web applications using the MVC framework provided by Apache Struts

3. After studied unit-3, Students are able to develop Enterprise web application using EJB.

4. After studied unit-4, Students are able to implement the Object-Relation Mapping

4. technique using Hibernate

5. After studied unit-5, Students are able to gets knowledge of Aspect Oriented Programming using Spring and Spring MVC.

SEM II	DESIGN AND ANALYSIS OF ALGORITHM

Course Outcomes

1. After studied unit-1, Students are able to prove the correctness and analyze the running time of the basic algorithms for those classic problems.

2. After studied unit-2, Students are able to learn the key techniques of Divide-and-Conquer

and Greedy Method.

3. After studied unit-3, Students are able to recognize the concept of Dynamic Programming

and its algorithms

4. After studied unit-4, Students are able to understand backtracking.

5. After studies unit-5, Students are able to understand Branch and Bound techniques for designing and analyzing algorithms.

SEM II	WEB APPLICATION USING C#.NET

Course Outcomes

1. After studied unit-1, Students are able to to know the differences between desktop

application and web application.

2. After studied unit-2, Students are able to construct classes, methods, and access
modifier

and instantiate objects.

3. After studied unit-3, Students are able create and manipulate GUI components in C#
for

windows application.

4. After studied unit-4, Students are able to code solutions and compile C# projects
within

the .NET framework.

5. After studies unit-5, Students are able to build the web application with Database.

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5. After studied unit-5, Students are able to gets knowledge of Aspect Oriented

Programming using Spring and Spring MVC.

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the .NET framework.

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SEM II	HUMAN COMPUTER INTERACTION

Course Outcomes

1. After studied unit-1, Students are able to plan and Develop procedures and life cycle of

Human Computer Interaction

2. After studied unit-2, Students are able to analyze product usage through appropriate

assessments and testing techniques.

3. After studied unit-3, Students are able to apply the interface structure standards/rules for

different users.

4. After studied unit-4, Students are able to encourage communication between understudies

of brain science, structure, and software engineering on UI improvement projects.

5. After studies unit-5, Students are able to understand the intensity of HCI in the cutting

edge world and the job it can play in advancing value, openness, and progress.

SEM II	SOCIAL INFORMATION NETWORKS

Course Outcomes

1. After studied unit-1, Students are able to clear understanding of real world applications.

2. After studied unit-2, Students are able to comprehend the elements of the social network

3. After studied unit-3, Students are able to demonstrate and envision the social network

4. After studied unit-4, Students are able to understand the role of web in the social

network.

5. After studies unit-5, Students are able to apply the concept of social network in

appropriate application.

SEM II	CLOUD COMPUTING

Course Outcomes (five outcomes for each unit should be mentioned)

1. After studied unit-1, Students are able to understand the broad perceptive of cloud architecture and model.

2. After studied unit-2, Students are able to understand the concept of parallel and distributed computing

3. After studied unit-3, Students are able to understand the different technologies.

4. After studied unit-4, Students are able to understand the features of virtualization.

5. After studies unit-5, Students are able to design the trusted cloud computing system with

different cloud platforms.

SEM II	PRINCIPLES OF WEB DESIGN

Course Outcomes

1. After studied unit-1, Students are able to learn how to combine basic HTML elements to create Web pages.

2. After studied unit-2, Students are able to understand the use of HTML tags and tag attributes to control a Web page 's appearance.

3. After studied unit-3, Students are able to understand capable to learn how to add absolute

URLs, relative URLs, and named anchors to Web pages.

4. After studied unit-4, Students are able to understand to gain a good understanding of using tables and frames as navigational aids on a Web site.

5. After studies unit-5, Students are able to control appearance webpages by applying style sheet.

SEM II	OPEN SOURCE APPLICATIONS

Course Outcomes

1. After studied unit-1, Students are able to understand the features of PHP

2. After studied unit-2, Students are able to develop the different applications using PHP.

3. After studied unit-3, Students are able to demonstrate the applications using PHP with

MySQL.

4. After studied unit-4, Students are able to understand the concepts of Perl.

5. After studies unit-5, Students are able to develop the applications using Perl.

SEM II	PROBLEM SOLVING TECHNIQUES

Course Outcomes

1. After studied unit-1, Students are able to develop programming techniques required to

solve a given problem.

2. After studied unit-2, Students are able to develop problem solving skill using top –
down

design principles

3. After studied unit-3, Students are able to design an algorithm for a problem.

4. After studied unit-4, Students are able to develop techniques to handle array structure

5. After studies unit-5, Students are able to develop techniques such as searching and

Sorting.

SEM III	DISTRIBUTED OPERATING SYSTEM

Course Outcomes

1. After studied unit-1, Students are able to understand foundations of Distributed
Systems.

2. After studied unit-2, Students are able to get the idea of memory management.

3. After studied unit-3, Students are able to comprehend in detail input and output process

4. After studied unit-4, Students are able to know the concept of multimedia operating

system.

5. After studied unit-5, Students are able to understand the concept of security
mechanism in distributed operating system.

SEM III	XML AND WEB SERVICES

Course Outcomes

1. After studied unit-1, Students are able to understand fundamental XML technology

2. After studied unit-2, Students are able to understand the use of JSON.

3. After studied unit-3, Students are able to design collaborating web services according to a

specification.

4. After studied unit-4, Students are able to know the concept of SOAP, WSDL and UDDI.

5. After studied unit-4, Students are able to know the role of web services in CMS.

SEM III	PROGRAMMING USING PYTHON LAB

Course Outcomes

1. After studied unit-1, Students are able to explore the fundamental concepts of Python.

2. After studied unit-2, Students are able to understand Basics of Python programming

language.

3. After studied unit-3, Students are able to solve simple problems using Python.

4. After studied unit-4, Students are able to understand about modules and packages.

5. After studied unit-5, Students are able to understand about the concept of Object-Oriented Programming.

SEM III	DISTRIBUTED OPERATING SYSTEM LAB

Course Outcomes

1. After studied unit-1, Students are able to understand foundations of Distributed Systems.

2. After studied unit-2, Students are able to get the idea of memory management.

3. After studied unit-3, Students are able to comprehend in detail input and output process

4. After studied unit-4, Students are able to know the concept of multimedia operating

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5. After studied unit-5, Students are able to understand about the concept of Object-Oriented Programming.

SEM III	BLOCK CHAIN TECHNOLOGY

Course Outcomes

1. After studied unit-1, Students are able to understand the function of Blockchain.

2. After studied unit-2, Students are able to understand the concepts of Blockchain

3. After studied unit-3, Students are able to understand the facts and myths related to

cryptocurrencies.

4. After studied unit-4, Students are able to apply the concept of Blockchain for various

applications.

5. After studied unit-5, Students are able to understand about the advanced concept of

Blockchain.

SEM III	INTERNET OF THINGS

Course Outcomes

1. Students are able to develop IOT based solution for real world applications.

2. Students are able to realize the evolution of Internet in Mobile Devices.

3., Students are able to understand the building blocks of Internet of Things.

4. Students are able to apply the concept of Blockchain for various applications.

5. Students are able to understand the IOT and its applications.

SEM III	NETWORK SECURITY

Course Outcomes

1. After studied unit-1, Students are able to identify some of the deriving factors needed for network security.

2. After studied unit-2, Students are able to identify and classify attacks and threats.

3. After studied unit-3, Students are able to compare and contrast symmetric and asymmetric encryption.

4. After studied unit-4, Students are able to identify the web systems vulnerable to attack.

5. After studied unit-5, Students are able to use appropriate secure mail applications and security protocols.

SEM III	PROGRAMMING USING C

Course Outcomes

1. After studied unit-1, Students are able to understand the concept of data types and operators.

2. After studied unit-2, Students are able to understand the concept of arrays and functions.

3. After studied unit-3, Students are able to understand the concept of pointers.

4. After studied unit-4, Students are able to understand the concept of storage classes and unions.

5. After studied unit-5, Students are able to understand file management in c language.

SEM III	PROGRAMMING USING C++

Course Outcomes

1. After studied unit-1, Students are able to understand Basic concepts of C++. 2.

2. After studied unit-2, Students are able to understand the concept functions.

3. After studied unit-3, Students are able to understand the concept of Classes and Objects.

4. After studied unit-4, Students are able to understand the about inheritance

and polymorphism.

5. After studied unit-5, Students are able to understand concept of exception handling files.

SEM III	PROGRAMMING USING PYTHON

Course Outcomes

1. After studied unit-1, Students are able to understand fundamental concept of python.

2. After studied unit-2, Students are able to understand the concept functions.

3. After studied unit-3, Students are able to understand the concepts of file handling.

4. After studied unit-4, Students are able to understand the concepts of object oriented

1. programming.

5. After studied unit-5, Students are able to understand concept of Regular Expressions.

SEM IV	MOBILE APPLICATION DEVELOPMENT

Course Outcomes

1. After studied unit-1, Students are able to know about the mobile application development environment.

2. After studied unit-2, Students are able to understand about fragments

3. After studied unit-3, Students are able to know about UI using views.

4. After studied unit-4, Students are able to understand about handling pictures

5. After studied unit-5, Students are able to understand concept of Telephony and SMS in

android.

SEM IV	SOFTWARE PROJECT MANAGEMENT

Course Outcomes

1. After studied unit-1, Students are able to understand the introduction to software project management.

2. After studied unit-2, Students are able to learn about project planning.

3. After studied unit-3, Students are able to know about effort estimation and activity planning for the project.

4. After studied unit-4, Students are able to understand about risk management.

5. After studied unit-5, Students are able to learn how to work in groups.

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5. After studied unit-5, Students are able to understand concept of Telephony and SMS in android.

SEM IV	BIG DATA ANALYTICS

Course Outcomes

1. After studied unit-1, Students are able to understand about big data.

2. After studied unit-2, Students are able to learn about big data analytics.

3. After studied unit-3, Students are able to know about concepts of database.

4. After studied unit-4, Students are able to understand the concept of Hadoop foundation and analytics.

5. After studied unit-5, Students are able to learn about Hadoop MapReduce and yarn framework.

SEM IV	ARTIFICIAL INTELLIGENCE

Course Outcomes

1. After studied unit-1, Students are able to understand about artificial intelligence.

2. After studied unit-2, Students are able to learn about heuristic search techniques.

3. After studied unit-3, Students are able to know about predicate logic.

4. After studied unit-4, Students are able to understand about representing knowledge using rules.

5. After studied unit-5, Students are able to learn about game playing.

SEM IV	MACHINE LEARNING

Course Outcomes

1. After studied unit-1, Students are able to understand about machine learning.

2. After studied unit-2, Students are able to learn about types of learning.

3. After studied unit-3, Students are able to learn about learning algorithms.

4. After studied unit-4, Students are able to understand about unsupervised and learning algorithms

5. After studied unit-5, Students are able to learn about IOT machine learning.

SEM IV	CYBER SECURITY

Course Outcomes

1. After studied unit-1, Students are able to understand about cyberoffenses.

2. After studied unit-2, Students are able to learn about types tools and methods using in cybercrime

3. After studied unit-3, Students are able to computer forensics.

4. After studied unit-4, Students are able to understand about cyber security.

5. After studied unit-5, Students are able to learn about cybercrime.

SEM IV	DECISION SUPPORT SYSTEM

Course Outcomes

1. After studied unit-1, Students are able to understand about design making system.

2. After studied unit-2, Students are able to learn about types group support system

3. After studied unit-3, Students are able to learn about knowledge-based system.

4. After studied unit-4, Students are able to understand about knowledge acquisition.

5. After studied unit-5, Students are able to learn about advanced intelligent system.

SEM IV	RESEARCH METHODS AND ETHICS

Course Outcomes

1. After studied unit-1, Students are able to understand about foundation of research.

2. After studied unit-2, Students are able to learn about problem identification and formulation.

3. After studied unit-3, Students are able to learn about research design.

4. After studied unit-4, Students are able to understand about qualitative and quantitative research.

5. After studied unit-5, Students are able to learn the concepts of measurements in research.