Dot Net Framework
Dot Net Framework
[CORE COURSE]

Semester: VI	Credits: 3	Subject Code: BC62204	Lectures: 48

Course Outcomes:

At the end of this course, the learner will be able to:

- Use the features of Dot Net Framework along with the features of VB, C# and ASP
- Design and develop window based and web based .NET applications
- Design and develop a Website
- Design and Implement database connectivity using ADO.NET for VB, C# and ASP

Unit 1: Introduction to .Net Framework and VB.Net	16

- What is Framework?
- Architecture of .Net
    - Common language Runtime
    - Common Type System(CTS)
    - Common Language Specification (CLS)
    - JIT compliers
    - Base Class Library
        - IDE (Integrated Development Environment)
- Event Driven Programming
- Basics of VB.Net :
    - Operators
    - Data types
    - Control Structures
- Build Windows Applications : Controls - Form, TextBox, Button, Label, CheckBox, Listbox, ComboBox, RadioButton. DateTimePicker, MonthCalender, Timer, Progressbar, Scrollbar, PictureBox, ImageBox, ImageList, TreeView, ListView, Toolbar, StatusBar, Datagridview
- Menus and PopUp Menu
- Predefined Dialog controls,DialogBox InputBox(), MessageBox(), MsgBox()

Unit 2: Introduction to C#	12

- Language Fundamentals
    - Data type and Control Constructs
        - Value and Reference Types, Boxing

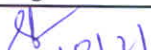| Board Of Studies	Name	Signature
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- o Arrays
- o String class and its various operations
  - o Functions
- Object Oriented Concepts
  - o Defining classes and Objects
  - o Access modifiers
  - o Constructots
  - o Inheritance
  - o Interface
  - o Abstract class
  - o Method Overloading and Overriding
  - o Delegates

Unit 3: **Introduction to ASP.NET**	10

- What isASP.NET?
- ASP.NET Page Life Cycle
- Architecture ofASP.NET
- Forms, WebPages, HTML forms,
- Request & Response in Non-ASP.NET pages
- Using ASP.NET Server Controls
- Overview of Control structures
- Functions
- HTML events
  - o ASP.NET Web control events
  - o Event driven programming and postback
  - Introduction to Web forms
    - o Web Controls
    - o Server Controls
    - o Client Controls
    - o Navigation Controls
    - o Validations
    - o Master Page
  - o State Management Techniques

Unit 4: **Architecture of ADO.Net**	10

- Basics of Ado.net
  - o Connection Object
  - o Command Object
  - o Dataset
  - o Data Table
  - o Data Reader Object
  - o Data Adapter Object

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- Datagridview& Data Binding: Insert, Update, Delete records
  - Navigation Using Data Source

#12 hours for Library work, assignments, practical or field work
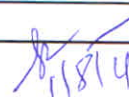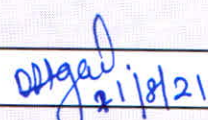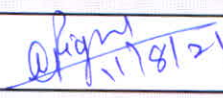
Recommended Text Books:

- *Beginning Visual C#*, Wrox Publication
- *Beginning ASP.NET3.5*, Wrox Publication

Reference Books:

- *Beginning Visual C#*, Wrox Publication
- *BeginningASP.NET3.5*, Wrox Publication
- Anne Prince and Doug Lowe ,*VB.NET database programming with ADO.NET*
- Francesco Balena ,*Programming Microsoft Visual Basic.NET*
- Jesse Liberty, Dan Maharry,Dan Hurwitz , *ProgrammingASP.NET3.5* ,O'Reilly
- Jefrey R. Shapiro , *The Complete Reference -Visual Basic .NET*
- Peter D, Blackburn, *William, ADO.NET Examples and Best Practices for C# Programmers*

Websites:

- www.w3cschool.com

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