DEGREE OF BACHELOR OF
COMPUTER APPLICATION
CHOICE BASED CREDIT SYSTEM

SYLLABUS FOR B.C.A

FOR THE STUDENTS ADMITTED FROM THE
ACADEMIC YEAR 2012 – 2013 ONWARDS
REGULATIONS FOR BCA (COMPUTER APPLICATIONS) DEGREE COURSE with Semester System
(Effective from the academic year 2012-2013)

REGULATIONS

1. ELIGIBILITY FOR ADMISSION

A candidate who has passed in Higher Secondary Examination with Mathematics or Business Mathematics or Computer Science or Statistics (Academic stream or Vocational stream) as one of the subject under Higher Secondary Board of Examination, Tamilnadu as per norms set by the Government of Tamilnadu or an Examination accepted as equivalent thereto by the syndicate, subject to such conditions as may be prescribed thereto are permitted to appear and qualify for the Bachelor of Computer Application degree examination of this university after a course of study of three academic years.

2. DURATION OF THE COURSE

The course shall extend over a period of three years comprising of six semesters with two semesters in one academic year. There shall not be less than 90 working days for each semester. Examination shall be conducted at the end of every semester for the respective subjects.

3. COURSE OF STUDY

The course of study shall comprise instruction in the following subjects according to the syllabus and books prescribed from time to time. The syllabus for various subjects shall be clearly demarcated into five viable UNITs in each paper/subject. Part -I, Part-II, Part – III and Part – IV subjects are as prescribed in the scheme of examination.
4. Examinations

The theory examination shall be three hours duration to each paper at the end of each semester. The candidate failing in any subject(s) will be permitted to appear for each failed subject(s) in the subsequent examination. The practical examinations for UG course should be conducted at the end of the even semester.

4.(a) Submission of record note books for practical examinations

Candidates appearing for practical examinations should submit bonafide Record Note Books prescribed for practical examinations, otherwise the candidates will not be permitted to appear for the practical examinations. However, in genuine cases where the students, who could not submit the record note books, they may be permitted to appear for the practical examinations, provided the concerned Head of the department from the institution of the candidate certified that the candidate has performed the experiments prescribed for the course. For such candidates who do not submit Record Books, zero (0) marks will be awarded for record note books.

5. Revision of Regulations and Curriculum

The University may revise /amend/ change the Regulations and Scheme of Examinations, if found necessary.

6(a). Passing Minimum – Theory

The candidate shall be declared to have passed the examination if the candidate secure not less than 40 marks out of 100 (CIA – 10 marks out of 25 and EA – 30 marks out of 75) in the University examination in each theory paper.

6(b). Passing Minimum – Practical

The candidate shall be declared to have passed the examination if the candidate secure not less than 40 marks put together out of 100 (CIA – 16 marks out of 40 and EA – 30 marks out of 60) in the University examination in each practical paper.
7. Question Paper Pattern for B.Sc.(CS /B.Sc.(IS)) /BCA Courses


PART – A  (10 x 2 = 20 Marks)
(Answer ALL questions), (Two questions from each UNIT)

PART – B  (5 x 5 = 25 Marks)
(Answer ALL questions) & (One question from each UNIT with Internal Choice)

PART – C  (3 x 10 = 30 Marks)
(Answer ANY THREE questions) & (Open Choice – 3 out of 5 questions)

7.1(b). THEORY - Internal Marks Distribution [CIA]  (Total Marks: 25)

- Attendance : 5 Marks
- Assignment : 5 Marks
- Internal Examinations : 15 Marks

7.2(a). PRACTICAL – Marks Distribution & Question paper Pattern  
(Max. Marks: 100)  
[External [EA]: 60 Marks & Internal [CIA]: 40 Marks]

PRACTICAL - External Marks Distribution (Total Marks: 60)

For each practical question the marks should be awarded as follows (External):

i) Algorithm / Flowchart - 20%
ii) Writing the program in the main answer book - 30%
iii) Test and debug the program - 30%
iv) Printing the correct output - 20%

(Marks may be proportionately reduced for the errors committed in each of the above)
PRACTICAL - Internal Marks Distribution (Total Marks: 40)

- Record : 15 Marks
- Internal Practical examinations : 25 Marks

PRACTICAL Question Paper Pattern

✓ Practical Exam must be conducted at end every Semester
✓ Practical - I to Practical –VI has same Patten
✓ Student may select any two questions out of four questions.

8. Commencement of this Regulation:
These regulations shall take effect from the academic year 2012-13, i.e, for students who are to be admitted to the first year of the course during the academic year 2012-13 and thereafter.

Scheme of Examinations from the Academic Year 2012-2013
Credit Distribution as per the University Norms.

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**Total Marks for III Semester: 600**

**Total Marks for IV Semester: 800**
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# ELECTIVE SUBJECTS

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## SBEC – Skill Based Elective Courses

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### ALLIED PAPERS

#### I - YEAR (Allied – I: First Option)

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#### I - YEAR (Allied – I: Second Option)

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#### I - Year / II-Year (Allied – I / II: Statistics - Third Option)

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### II - YEAR (Allied – II: COMMERCE - FIRST Option)

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### II - YEAR (Allied – II: ELECTRONICS - SECOND Option)

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### II - YEAR (Allied – II: PHYSICS - Third Option)

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Non Major Elective Course – (NMEC)

Extra Disciplinary Subjects offered by the Department of Computer Science/Applications

The department can offer any one of the subjects to the other major subject students in each semester.

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UNIT – I

UNIT – II

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UNIT IV


Table Handling: OCCURS clause and Subscripting – Assigning Values to Table Elements – Multidimensional Tables - PERFORM Verb and Table Handling – Indexed Tables and Indexing – SET verb – SEARCH Verb – OCCURS DEPENDING Clause – Storing a Table – Index Data Item – Use of Indexes and Index Data Items – Simple Programs.

UNIT V


BOOKS FOR STUDY


BOOK FOR REFERENCE

COBOL programming list:

1. Finding sum of N natural numbers
2. Program to calculate the simple and compound interest
3. Program to sort n numbers in ascending/ descending order
4. Program to reverse a string
5. Program to add two matrices
6. Program to subtract two matrices
7. Program to multiply two matrices
8. Program to transpose a given matrix
9. Program for inventory control
10. Preparation of mark sheet/ exam result processing
11. Payroll and pay slips preparation
12. Preparation of student information system
13. Program for electricity bill preparation
14. Program for library information system – updating issues and receipts
15. Sequential files – sorting/merging
PERIYAR UNIVERSITY, SALEM – 636 011

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UNIT – I

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UNIT – IV

UNIT – V

BOOK FOR STUDY

BOOKS FOR REFERENCE
2. PROGRAMMING IN C, B.L.JUNEJA, Cengage Learning India
C PROGRAMMING LIST

1. Write a program to find the largest number and smaller number by using if statement.
2. Write a program to convert the decimal to binary conversion by using while statement.
3. Write a program to count the positive, negative & zero numbers.
4. Write a program to check whether a given number is a prime or not.
5. Write a program to display the Fibonacci series.
6. Write a program to concatenate two strings without using string library function.
7. Write a program to count the number of vowels, consonants, and digits in a line of text.
8. Write a program to reverse a string.
9. Write a program to design the calculator functions as (i) Addition (ii) Subtraction &
   (iii) Multiplication function.
10. Write a program to find the factorial of a number using recursion.
11. Write a program for ascending order of given N Numbers.
12. Write a program to separate odd and even numbers using file.
UNIT I


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UNIT IV


UNIT V


**BOOKS FOR STUDY:**

1. “Classic Data Structures”, D. Samanta, PHI Learning, New Delhi 2011

**BOOK FOR REFERENCE**

UNIT – I

UNIT – II

UNIT – III
UNIT – IV

UNIT – V
Templates: Class Templates – Class Templates with Multiple Parameters – Function Templates – Function Templates with Multiple Parameters – Overloading of Template Functions – Member Function Templates – Non-Type Template Arguments, Exception Handling: Basics - Exception Handling Mechanism – Throwing Mechanism – Catching Mechanism – Rethrowing an Exception – Specifying Exceptions

BOOKS FOR STUDY:
BOOK FOR STUDY

BOOKS FOR REFERENCE:
UNIT – I

UNIT – II

UNIT – III
UNIT – IV

**User Interface Design:** Characteristics of a User Interface – Basic Concepts – Types of User Interfaces – Component-Based GUI Development – User Interface Design Methodology.


UNIT – V


**Software Reuse:** Introduction – Issues in any Reuse Program – Reuse Approach – Reuse at Organization Level.

**BOOK FOR STUDY:**
Fundamentals of Software Engineering  
RAJIB MALL, Prentice Hall of India Private Limited, 2008
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**C++ PROGRAMMING LIST:**

1. Implement Push and Pop Operations of a Stack using Array

2. Implement Add and Delete Operations on Queue using Pointer

3. Write a Program to Convert an Infix Expression to Postfix Expression using Arrays.

4. Write a Program to Add Two Polynomials using Pointers.

5. Perform Tree Traversals for a Binary Tree using Recursion.

6. Write a program to perform Binary Search.

7. Sort the given list of numbers using Heap Sort.

8. Sort the given list of numbers using Quick Sort
**PERIYAR UNIVERSITY, SALEM – 636 011**

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**UNIT – I**

**UNIT – II**

**UNIT – III**

**UNIT -IV**
UNIT - V


**BOOK FOR STUDIES**


*UNIT -IV: Chapters 10 & 11 UNIT -V: Chapters 12, 13 & 14*
UNIT I

UNIT II
Installing Red Hat Linux Applications, Running Window Application, Running Window, DOS and Macintosh Applications –Tools for using Internet and Web.

UNIT III

UNIT IV
Setting Up and Supporting users: Creating user accounts – Setting user defaults –Creating Desktops-Modifying and Deleting Accounts.

UNIT V

Book FOR STUDY

BOOK FOR Reference
UNIT – I
Operating system overview: Operating system objectives and functions-Evaluation of O.S – Major achievements

UNIT – II

UNIT – III
Memory management: Requirements – Memory partitioning – Paging – Segmentation.
Virtual memory: Hardware and control structures – Operating system software.

UNIT – IV

UNIT – V

BOOK FOR STUDY
Linux LAB

Write Shell Programs for the following using the Linux Operating System

1. Check whether the given number is prime or not.
2. Find the biggest of given two numbers
3. Write a program to check the given number is odd or even
4. Write a program to generate Fibonacci Series
5. Write a program to prepare electric bill for domestic consumers.
   - For first 100 UNITs - Rs.0.75/UNIT
   - For next 100 UNITs - Rs.1.50/UNIT
   - Above 200 UNITs - Rs.3.00/UNIT
   Prepare the bill for the following format:
   - Customer No. ---------
   - Customer Name ---------
   - Pre.Reading ---------
   - Cur.Reading ---------
   - UNITs Consumed ---------
   - Charge ---------
   - Signature
6. Write a program to display the result PASS or FAIL using the information given below:
   - Student Name, Student Reg. No., Mark1, Mark2, Mark3, Mark4. The minimum pass for each subject is 50.
7 Write a program to prepare a Payroll with Basic Pay, DA, Allowances, PF and Gross Pay.

8 Using Case Statement, write a program to check the files ending with vowels.
9 Write a single program to sort the names and numbers in alphabetical, ascending and descending order.
10 Write a menu driven program to print Biodata for five persons.
UNIT – I


UNIT – II

Classes, Interfaces and Packages: Classes – Objects – Wrapper Classes – Packages and Interfaces.

UNIT – III

Inheritance: Inheritance Extending classes – Abstract and Final classes – Interfaces and Inheritance

UNIT – IV

Exception Handling: Error Handling and Exception Handling – Exception Types and Hierarchy – Try Catch blocks – Use of Throw, Throws and Finally – Programmer Defined Exceptions.

UNIT – V

Applets and Graphics: Fundamentals of Applets – Graphics. AWT and Event Handling: AWT components and Event Handlers – AWT Controls and Event Handling Types and
Examples – Swing- Introduction. **Input and Output:** Files – Streams. **Multithreading and Networking:** Multiple Threads – Networking basics.

**BOOK FOR STUDY**

**BOOKS FOR REFERENCE**
UNIT – I


UNIT – II


UNIT – III


UNIT – IV

UNIT – V

BOOK FOR STUDY:
“Computer Networks” Andrew S. Tanenbaum, Third edition, PHI private Ltd, New Delhi, 1999
UNIT -I


UNIT -II


UNIT -III


UNIT -IV

UNIT -V


BOOK FOR STUDY:

COMPUTER GRAPHICS – Donald Hearn, M. Pauline Baker, 2nd edition, PHI.
JAVA LIST OF PROGRAMMS

1. Write a Program to create an account in a Bank and Deposit Rs.20,000 with a minimum Balance of Rs.500. Use switch case statement for Deposit, Withdrawal and for Balance enquiry.

2. Write a program to find the area of the square, rectangle and triangle using the method of overloading.

3. Write a program to display the book title, price and author name using the method of overriding.

4. Implement the concept of multiple inheritances to develop pay slip and design a package

5. Write a program to illustrate the use of multithreads.

6. Create a try block that is likely to generate three types of exception and then incorporate necessary catch blocks to catch and handle them appropriately

7. Write a program to copy characters from one file to another file.

8. Develop a java applet, which shows your name and address within a window frame.
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<td>ActiveX Data Objects – Crystal and Data Report – Active X.</td>
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**BOOK FOR STUDY**

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BOOK FOR STUDY


BOOKS FOR REFERENCE

2. Spring into PHP5 – Steven Holzer, Tata McCraw Hill Edition
Programming in VISUAL BASIC Practical List

1. Develop a VB Project to Insert a Record in MS-ACCESS database using ADO.
2. Develop a VB Project to modify a record in MS-ACCESS database using ADO.
3. Construction of an Arithmetic Calculator (Simple)
4. Personal Information System (Using Tables)
5. Railways Reservation System (Using Tables)
6. Library Information System (Using Tables)

PHP Practical List

1. Write a program using controls and functions
2. Develop a program and check message passing mechanism between pages.
3. Design a program using String function and Arrays.
4. Develop a program using parsing functions (use Tokenizing)
5. Write a program and check Regular Expression, HTML functions, Hashing functions.
6. Develop a program and check File System functions, Network functions, Date and time functions.
7. Design a program using session
8. Develop a program using cookie and session
UNIT I

UNIT II

UNIT III

UNIT IV

UNIT V
BOOK FOR STUDY:
“Multimedia: Making It Work” - Tay Vaughan (Eight Edition)

BOOK FOR REFERENCE
Ralf Steinmetz & Klara Nahrstedt – “Multimedia Computing, Communication & Applications“ Pearson Education
UNIT-I

UNIT-II

UNIT-III
Components of Client/Server Applications – Connectivity: Open System Interconnect – Communications Interface Technology – Interprocess communication – WAN Technologies.

UNIT-IV
UNIT-V

Components of Client/Server applications–Service and Support: System Administration.


BOOK FOR STUDY

CLIENT/SERVER COMPUTING – Patrick Smith, Steve Guenferich, 2nd edition,
Prentice Hall of India Private Limited, New Delhi
UNIT – I

UNIT – II

UNIT – III

UNIT – IV

UNIT – V
Object-oriented Technology (OOT) – Client Server Architecture – Business process Re-engineering (BPR)

BOOK FOR STUDY:
Management Information System – W.S. Javadekar, TMH
UNIT – I

UNIT – II

Unit – III

UNIT – IV

UNIT – V


BOOK FOR STUDY

UNIT – I

**Introduction to Compliers:** Compliers and Translator – Need of Translator – The structure of a Complier – Lexical analysis – Syntax analysis – Intermediate code generation – optimization – code generation – Complier – writing tools. **Finite automata and lexical Analysis:** The role of the lexical analysis – A simple approach to the design of lexical analyzers- Regular expressions to finite automata – Minimizing the number of states of a DFA.

UNIT – II


UNIT – III


UNIT – IV

**Run time storage administration:** Implementation of a simple stack allocation scheme – implementation of block-structured languages – storage allocation in block structured languages. **Error deduction and recovery:** errors – lexical phase errors – syntactic phase errors – semantic errors.
UNIT – V


**BOOK FOR STUDY**

UNIT I

**History of E-commerce and Indian Business Context**: E-Commerce – Emergence of the Internet – Emergence of the WWW – Advantages of E-Commerce – Transition to E-Commerce in India – The Internet and India – E-transition Challenges for Indian Corporates.


UNIT II


UNIT III


**Legal and Ethical Issues**: Cyberstalking – Privacy is at Risk in the Internet Age – Phishing – Application Fraud – Skimming – Copyright – Internet Gambling – Threats to Children.

UNIT IV

UNIT V


BOOK FOR STUDY

BOOK FOR REFERENCE
E-Commerce Strategy, Technologies and Applications David Whiteley Tata Mc-Graw-Hill
UNIT - I
Introduction to software project management – Project evaluation and Programme Management – An overview of Project Planning.

UNIT - II
Selection of an appropriate project approach – Software effort estimation – Activity planning

UNIT - III
Risk management - Resource allocation.

UNIT - IV
Monitoring and control - Managing contracts.

UNIT - V

BOOK FOR STUDY
“Software Project Management” by Bob Hughes and Mike Cotterell, Tata McGraw-Hill 5th Edition
UNIT – I

UNIT – II

UNIT – III

UNIT – IV
UNIT – V


Book for Study:
Introduction to Artificial Intelligence, Rajendra Akerkar, PHI
UNIT – I


UNIT – II

**Classification:** Introduction – decision tree – over fitting and pruning - DT rules – naïve bayes method – estimation predictive accuracy of classification methods - other evaluation criteria for classification method – classification software

UNIT – III


UNIT – IV

**Web data mining:** Introduction- web terminology and characteristics – locality and hierarchy in the web - web content mining - web usage mining - web structure mining – web mining software - **Search engines:** Search engines functionality – search engines architecture – ranking of web pages.
UNIT – V

Data Warehousing: Introduction – Operational data sources- data warehousing - Data warehousing design – Guidelines for data warehousing implementation - Data warehousing metadata - Online analytical processing (OLAP): Introduction – OLAP characteristics of OLAP system – Multidimensional view and data cube - Data cube implementation - Data cube operations OLAP implementation guidelines

BOOK FOR STUDY:

BOOK FOR REFERENCE
Data Mining Techniques, Arun K Pujari, University Press
PERIYAR UNIVERSITY, SALEM – 636 011

SBEC-1: Basics on Internet

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UNIT I

What is Internet? The Internet’s underlying Architecture

UNIT II

Connecting to the Internet – Communicating on the Internet

UNIT III

How the World Wide Web works. Common Internet tools

UNIT IV

Multimedia on the Internet – Intranet and shopping on the Internet

UNIT V

Safeguarding the Internet

Text Book:

PERIYAR UNIVERSITY, SALEM – 636 011

SBEC-II: Exploring on Word

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UNIT I

UNIT II

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UNIT IV
Bulleted and Numbered Lists: - Create and Modify Lists - Presenting Information in Columns. Creating Table: Creating a Table: Create a Tabular List – Present Information in a Table.

UNIT V
Formatting a Table: Format Table Information – Perform Calculation in a Table – Use a Table to Control Page Layout.

BOOK FOR STUDY
Step by Step 2007 Microsoft Office System Joyce Cox & Team , PHI Learning Private limited, New Delhi, 2009
UNIT I:
Setting Up a Workbook: Creating Workbooks – Modifying Workbooks – Modifying Worksheets – Customizing the Excel 200 Program Window – Arranging Multiple Workbook Windows. Working with Data and Data Tables: Entering and Revising Data – Moving Data within a Workbook – Finding and Replacing Data – Defining a Table. Performing

UNIT II:

UNIT III:
Starting a New Presentation: Quickly Creating a Presentation – Creating a Presentation Based on a Ready-Made design – Converting an Outline to a Presentation. Working with Slide Text: Entering Text – Editing Text – Adding and Manipulating Text Boxes – Correcting and Sizing Text While Typing – Checking Spelling and Choosing the Best Words.

UNIT IV:
Adjusting the Slide Layout, Order, and Look: Changing the Layout of a Slide – Rearranging Slides in a Presentation – Applying a Theme – Switching to a Different Color Scheme – Using Colors That Are Not Part of the Scheme – Adding Shading and Texture to the Background of a Slide.
UNIT V:
Delivering a Presentation Electronically: Adapting a Presentation for Different Audiences – Rehearsing a Presentation – Preparing a Presentation – Preparing Speaker Notes and Handouts – Preparing a Presentation for Travel.

BOOK FOR STUDY
Step by Step 2007 Microsoft Office System Joyce Cox & Team , PHI Learning Private limited, New Delhi, 2009
SBEC-IV : Web Programming (Java script and VB script)

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UNIT – I

UNIT – II

UNIT – III

UNIT – IV
Java Script Objects: Introduction – Thinking about objects – Math, Strings, Date, Boolean and Number Objects.

UNIT – V

BOOK FOR STUDY
Web Technology – A Developer’s Perspective, N.P. Gopalan, J. Akilandeswari,
PHI Learning Private Limited, New Delhi, New Delhi.
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UNIT I

**Nature of technical communication:** Stages of communication – Channels of communication – Nature of technical communication – Importance and need for technical communication – Technical communication skills.

UNIT II

**The Listening process:** Types of listening – Listening with a purpose – Barriers to listening – The speech process – Conversion and oral skills – Body language.

UNIT III

**Job interviews:** Pre – interview preparation techniques – Interview questions – Answering strategies – Frequently asked interview questions – Projecting a positive image – Alternative interview formats.

UNIT IV

**Group Discussion:** Nature of group discussion – Characteristics of successful group discussions – Selection group discussion – Group discussion strategies – Techniques for individual contribution – Group interaction strategies.

UNIT V

**Presentation Skills:** Planning the presentation – Preparing the presentation – Organizing your presentation – Rehearsing the presentation – Improving delivery

**BOOK FOR STUDY**

PERIYAR UNIVERSITY, SALEM – 636 011

**SBEC - VI : FLASH**

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**UNIT – I**
Introducing Flash: How Flash works – Uses of Flash – Obtaining Flash – Installing Flash –
The Flash Environment- Getting Started: The Timeline – The Stage – Tools and toolbars –

**UNIT – II**
Accessibility Creating Objects: Stage and overlay objects – Tools panel. Editing Objects :
Grouping objects – Free Transform tool – Reshaping objects – Aligning objects

**UNIT – III**
Pixel snapping – Stacking order – Cut aways – Paste in place. Color and Text: Standard
Color palette – Adding solid colors – Adding gradients – Fill Transform tool – More color
options – Selecting colors – Adding, Formatting and Manipulating text.

**UNIT – IV**
Symbols and Instances: Definitions – The Library – Converting objects to symbols – Creating
a new symbol – Symbol Editing Mode – Editing symbols – Editing Instances.
Sound and Video: Using sound – Importing sound – Editing sounds, Adding video –
Manipulating video.

**UNIT – V**
Frames and Layers: Working with frames – Adding frames – Deleting and copying frames –
Frame properties – Working with layers – Inserting layers – Deleting and copying layers –
Animation: Elements of animation – Scenes – Frame-by-frame animation – Motion tweening
– Motion guides – Shape tweening – Animating text – Distribute text to layers – Movie clips.

**BOOK FOR STUDY:**
1. “FLASH MX in easy steps” - NICK VANDOME, Dreamtech, New Delhi
UNIT - I
Introduction to Information Technology: Information Technology – Understanding the Digital Domain – Representing Numbers and text in Binary - binary codes

UNIT - II

UNIT - III
Transmission of Information: Fundamentals of Communications – Fiber Optics – Wireless Communications -ISDN

UNIT - IV
Computer Networking: Goals – Topologies - Local Area Networks – Wide Area Networks – Communication Protocols-

UNIT - V
Internet: Internet Architecture -- Types-Network Security-Internet applications- Internet address- domain name- E-mail

BOOK FOR STUDY:

1. Introduction to Information Technology Pelin Aksoy, Laura DeNardis, Cengage Learning India Private Limited, First Indian Reprint 2008.
PERIYAR UNIVERSITY, SALEM – 636 011

**NMEC-I : Basics of Computers and Office Automation**

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**UNIT – I**

**UNIT – II**

**UNIT – III**

**UNIT – IV**
MS-EXCEL: Creating a Simple Spreadsheet – Editing a Spreadsheet – Working with Functions and Formula – Formatting Worksheets – Completing Your Spreadsheet – Creating Charts

**UNIT – V**
MS-POWERPOINT: Creating and Viewing Presentations – Editing a Presentation – Working with Presentation Special Effects

**BOOK FOR STUDY:**

1. Introduction to Computers – Alex Leon, Mathew Leon  (UNIT – I)
2. Microsoft Office XP – fast & easy   (UNIT II, III, IV & V)
   Author: DIANE KOERS
   Publisher: Prentice Hall of India Private Limited, New Delhi, 2001
PERIYAR UNIVERSITY, SALEM – 636 011

NMEC-II: Introduction to Object Oriented Programming Language C++

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UNIT – I
Overview of C++ Language: Object Oriented Concepts – Characteristics- Advantages-
Keywords and Identifiers-Constants-Variables-Data types- Operators and Expressions

UNIT – II
Looping Statements: while Loop-For Loop Do-While Loop-Jumps in Loops – Break – Continue statements

UNIT – III
Functions: Advantages of Functions-Classification of Functions-Inline Functions-Function Overloading –Reference Variables – Storage Classes -Arrays: Definition of an Arrays-Arrays and Functions- Simple programs

UNIT – IV
Classes and Objects- Passing Objects as arguments – Returning an object from functions – Arrays of objects – Members of classes – Static member data – Static member functions - Simple programs

UNIT – V
Constructors and Destructors-Types of Constructors-Destructor and its Characteristics, Inheritance- Simple programs Types of Inheritance –Simple programs

BOOK FOR STUDY:
“Programming in C++”, M. T. Somashekara, Prentice Hall of India Private Limited,
New Delhi, 2008
PERIYAR UNIVERSITY, SALEM – 636 011

NMEC-II : HTML and Web Design

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UNIT – I

UNIT – II
Style Sheets and Graphics: Introduction to Style sheets

UNIT – III

UNIT – IV

UNIT – V
Layouts: Creating Division-Based Layouts – Creating User Forms – Using Frames for Layout – Incorporating Audio and Video

BOOK FOR STUDY:

BOOK FOR REFERENCE: