

Information Technology (IT)

Paper-I

Theory – 40
Practical - 60

Unit.I Digital Literacy:

- Understand the fundamentals of computing
- Identify the components of a computer
- Identify the steps for starting & shutting down a computer
- Use a mouse & keyboard
- Understanding the Operating System and features
- Manage files & folders and Perform basic file operations
- Connect to the Internet
- Browse web pages
- Navigate websites
- Creating and using email
- Use search engines
- Understand digital technologies media devices
- Identify measures to protect a computer against natural and human threats

Unit.II Word Processing:

- Design, create and modify a range of business documents
- Displaying Different Views of a Document
- Creating and Saving a Document
- Selecting, Modifying, Finding and Replace Text
- Align Text Using Tabs,
- Display Text as List Items
- Apply Borders and Shading
- Preview a document, and adjust its margins and orientation.
- Insert & Format a Table
- Convert Text to a Table
- Check Spelling and Grammar
- Use the Thesaurus
- Print with default or custom settings

Unit.III Spreadsheet:

- Identify elements of the user interface, view a presentation,
- Save a presentation, use Microsoft PowerPoint help
- Creating a Basic Presentation,
- Select a presentation type, enter text, edit text, format text placeholders, add slides to a presentation, arrange slides, work with themes
- Formatting text on slides, apply character styles, format paragraphs
- Adding Graphical Objects to a presentation, Insert images into a presentation, add shapes
- Adding visual style to text in a presentation

Unit.IV E-Mail Messaging:

- Getting Started with Messaging, identify the user interface, identify the outlook ribbon, identify the tabs and commands in the message form, using help

- Creating an email message, formatting, check spelling and grammar, attach a file,enhance an email
- Sending and receiving email messages, read, reply to and forward, delete and print an email message
- Organizing Email Messages, move email messages into folders, open and save anattachment
- Managing contacts, add a contact, sorting and finding contacts, find the geographical location of a contact, update contacts

Practicals

- Construct a spreadsheet and populating Cell Data
- Customize the Interface
- Formatting Cells - Search Worksheet Data, Changing Fonts
- Modify Rows and Columns
- Managing Worksheets and Workbooks
- Applying Formulas and Functions
- Inserting Currency Symbols
- Merging cells
- Spell Check a Worksheet
- Add Borders and Colour to Cells
- Printing options to output a chart, worksheet, workbook, according to specifications

Paper-II

Theory – 40
Practical - 60

Unit.I Digital Literacy:

- Exploring OS Accessibility features
- Going Wireless and setting up devices
- Networking Fundamentals
- Use instant messaging
- Perform online transactions
- Understand security settings
- Identify best practices for securing online and network transactions
- Identify measures to protect privacy
- Create & publish web pages

Unit.II Database

- Understanding Core Database Concepts
- Creating Database Objects
- Manipulating Data
- Understanding Data Storage
- Administering a Database
- Requirements for Databases
- Building Tables
- Building Forms
- Creating and Managing Queries
- Designing Reports

Unit-III Computer Networks:

- Network Infrastructure - Internet, intranet, and extranet.
- Understand the OSI model.
- TCP/IP
- Local area networks (LANs), Wide area networks (WANs).
- Network topologies and access methods.
- Network Hardware - switches.
- Routers, media types.
- Protocols and Services
- Understand IPv4 & IPv6.
- Addressing names resolution & networking services.

Unit.IV Web Design:

- Basics of web page design using HTML - Create and view the web pages in browser,
- HTML Basic tags, Image tags, Frames, Forms
- JavaScript and VBScript
- Microsoft Expression Web
- Web Site Design Scripting Tools
- Hypertext
- Authoring tools
- E- Commerce

Unit.V Word Processing:

- Templates for Document Creation
- Use the Mail Merge Feature including Envelopes and Labels
- Creating Macros and Automating Tasks
- Linking Word Documents to Data in an Excel Worksheet
- Send a Document Outline to Microsoft Office PowerPoint
- Save and Share a Document for Review, understanding Track Changes and Comments
- Comparing and Merging Document Changes

Practicals

- Adding hyperlinks
- Analyzing Data Using PivotTables and Pivot Charts
- Filter Data Using Slicers
- Protect Files
- Adding Comments to a cell
- Share a Workbook
- Set Revision Tracking Review Tracked Revisions
- Merge Workbooks
- Administer Digital Signatures
- Restrict Document Access
- Inserting and modifying smartart graphics to a presentation
- Add multimedia elements, customize slide component animations
- Customizing a slide show, annotate a presentation, create a presenter-independent slide show, set up a slide show to repeat automatically

Email Messaging:

- Specify folder permissions, access another user's folder, send calendar information in an email message, delegate folder access to users
- Customizing the quick access toolbar, to-do bar and creating a folder home page
- Personalizing Email - apply stationery and themes, creating and modifying signatures, configuring email security settings
- Organizing items - group items, create search folders, apply conditional formatting
- Back up items, add data files to a mail profile, change data file settings

Software Development:

- Understanding Core Programming
- Understanding Object-Oriented Programming
- Understanding General Software Development
- Understanding Web Applications
- Understanding Desktop Applications

Web Development:

- Programming Web Applications
- Working with Data and Services
- Troubleshooting and Debugging Web Applications
- Working with Client-Side Scripting
- Configuring and Deploying Web Applications
- Set Page Breaks, Page Layout Options
- Manage Workbook Views
- Apply Cell and Range Names

- Auto Sum in Cells
- Calculate Data Across Worksheets
- Sort or Filter Worksheet or Table Data
- Create, Modify and Format Charts
- Create, modify and format spreadsheets using the full range of the software formatting features including conditional formatting for example Hide/unhide/freeze rows and columns
- Using multiple worksheets and linking cells
- Sharing worksheet data with other users