

## COMPUTER SCIENCE-11

### UNIT 1: BASICS OF INFORMATION TECHNOLOGY

Overview (Pg.1,2), Hardware and Software (Pg. 2-4), System Software VS Application Software (Pg. 15-16), Basic Units of Data Storage (Pg. 16-17), Word (Pg. 17-18), System Development (Pg. 18-22)

**Classwork:** Q.1 (i, ii, iii, vii ) (Pg.22), Q.4, 13 (Pg.24)

**Homework:** Q.5, 15 (Pg. 24)

### UNIT 2: INFORMATION NETWORKS

Overview (Pg. 25), Workgroup Computing (Pg. 25-26), Internet (Pg.27-29), Components of network (Pg. 29-31), LAN vs WAN (Pg. 32-33), Network Standards (Pg. 35), Network Topologies (Pg. 35- 38), Open System Interconnection (OSI) Model (Pg. 37-38)

**Classwork:** Q.1 (i, iii- x), Q.2(i- viii) (Pg. 39), Q.3(ii-vi, viii-x) (Pg. 40), Q.4,5,8 (Pg.40)

**Homework:** Q.6, 11 (Pg. 40)

### UNIT 3: DATA COMMUNICATIONS

Overview (Pg. 41), Components of Data Communication (Pg.42), Signals (Pg.42-43), Types of Data (Pg. 43), Types of Data Transmission (Pg. 46 -53)

**Classwork:** Q.1 (i- iv, vii, xi-x) (Pg. 56), Q.2(i, ii, v) (Pg. 55-56), Q.3(iii, v-vii) (Pg. 56), Q.4, 6, 9 (Pg. 56)

**Homework:** Q.7, 10 (Pg. 56)

### UNIT 4: APPLICATIONS AND USES OF COMPUTER

Overview (Pg. 57), Uses of Computers in different Fields (Business, E-Commerce, Computer Added Design, Simulations only) (Pg. 57-67)

**Class Work:** Q.5, 6 (Pg. 70)

**Home Work:** Q.10 (Pg. 70)

### UNIT 5: COMPUTER ARCHITECTURE

Overview (Pg.71-76), Bus Interconnection (Pg.76-78), The I/O Unit (Pg.78-81), Instruction Format (Pg. 82-84), Operating Systems (Pg. 85-86), The Translators and Their Functions (Pg. 87)

**Classwork:** Q.1, 2, 3(Pg. 88-89), Q.4, 5, 7, 10, 11 (Pg. 90)

**Homework:** Q.6, 8, 9, 14 (Pg. 90)

### UNIT 6: SECURITY, COPYRIGHT AND LAW

Overview (Pg.91), Virus and Antivirus issues (Pg. 91-94), Data Security (Pg. 94-97)

**Classwork:** Q.1 (i- vi ) (Pg. 100 ), Q.2 (Pg. 100-101), Q.3(i- iv, vi- viii) (Pg. 101-102), Q.4, 5, 6 (Pg.102)

**Homework:** Q.9, 10, 11 (Pg. 102)

### UNIT 7: WINDOWS OPERATING SYSTEM

Overview (Pg.103), Types of Operating System (Pg. 103-105), Starting to use Windows Operating System ( Objects of Windows Operating system, Features of Windows only)

(Pg. 105-107, 108- 109), Disk Management (Pg.109-110)

**Classwork:** Q.1(i-vi, viii, x) (Pg.113), Q.2(Pg.113), Q.3(i, ii, v, viii -x) (Pg.114), Q.4,6,8(Pg.114)

**Homework:** Q.5, 9, 10 (Pg. 114)

### **UNIT 8: WORD PROCESSING**

Overview (Pg. 115), What is Word Processor? (Pg. 115- 116), A Simple Word Processor (Pg. 116), Full Featured Word Processor (Pg.116-118)

**Classwork:** Q.2(i, ii,) (Pg. 131), Q.5 (Pg. 132)

**Homework:** Q.6 (Pg. 132)

### **UNIT 9: SPREADSHEET SOFTWARE**

Overview (Pg. 133), Features of Spreadsheet Software (Pg. 133), Basics of Worksheet (Pg.135- 137), Working with Formulas (Pg. 137-138), Functions (Pg.138-139), Introducing Charts (Pg. 142-143)

**Classwork:** Q.1 (i- vi, viii-x) (Pg. 144-145), Q.2(Pg. 145), Q.3(i- iv, vi-x) (Pg. 145), Q.4, 5 (Pg.146)

**Homework:** Q.8, 9 (Pg. 146)

### **UNIT 10: FUNDAMENTAL OF THE INTERNET**

Overview (Pg.147), Addressing Schemes (Pg.148-149), Web Browsing (URL (Uniform Resource Locator) only) (Pg. 149,150), Email (Email Address only) (Pg. 152), Newsgroups (Pg. 152)

**Class Work:** Q.1 (iii, viii, ix) (Pg. 153),Q. 2 (Pg. 153), Q.3(i, iii, vi, vii, ix, x) (Pg. 154)

**Home Work:** Q.6 (Pg. 154)

### **LIST OF PRACTICALS GRADE XI:**

#### **MS-EXCEL**

1. Inserting & Deleting Cells, Rows and Columns
2. Managing Worksheets
3. Use Formulas and Functions ( formatting numbers, decimal places, column & rows setup etc).
4. Draw different types of charts
5. Use shortcuts

#### **INTERNET EXPLORER**

6. Send/ receive email to single user, multiple users.
7. Browsing Internet
8. Use of Shortcuts

#### **Note:**

Objective and subjective type papers should be given from the retained topics and exercise questions.