

Learning Outcomes

- Awareness of software in open domain and their licensing Scheme
- Awareness of ethical practices in computing
- Awareness of Cyber Security and Netiquette
- Understanding of internet operations & Web applications
- Understanding various components of computer system including peripherals of different types
- Ability to demonstrate creation of tables and integrating with (word documents) e-publishing operations
- Ability to use image creation and editing tools
- Ability to demonstrate touch typing with speed and accuracy on different layouts, e.g QWERTY and INSCRIPT
- Ability to demonstrate conversions of various file format and creating UNICODE compliant document

NOTE:

This Paper has been divided in two parts i.e. theory and practical .The division of marks of theory and practical is as given below:

Theory	30 Marks
Practical	70 Marks
Total	100 marks

1. As per CCE guidelines the syllabus for e-typewriting –English /Hindi for classes IX and X has been divided term wise.
2. The units specified for each term shall be assessed through both formative and summative assessments.
3. In each term, there will be two formative assessments with each carrying a 10% weightage.
4. The summative Assessments in the first term and second term will carry 30% weightage for each term.
5. In both summative assessment I and II, there will be on theory paper of 30 Marks of 2 hours duration and one practical paper of 70 Marks of 1 hour duration.
6. The formative Assessment 1 & 2 for the first term and formative assessment 3 & 4 for the second term will include assignment, observation, Viva/oral test and practical.

Class IX – Term I		Maximum Marks: 30		Periods:30	
		Marks	Periods	Th Pds.	Pr. Pds
1.	Introduction to Computing	12	8	2	6
2.	Efficient e-typing	8	7	2	5
3.	Introduction to Word Processing :	10	15	5	10
Total		30	30	9	21
Class IX – Term II		Maximum Marks: 30		Periods:30	
		Marks	Periods	Th Pds.	Pr. Pds
4.	Software in Open domain	6	3	2	1
5.	Ethical Practice	2	3	1	2
6.	Creating and editing image and text document	12	10	3	7
7.	Working with spreadsheet	10	14	3	11
Total		30	30	9	21

Class IX – Term I

Theory

Maximum Marks: 30

1. Introduction to Computing 12 marks
 - 1.1. Understanding Hardware - Starting and shutting down a Computer and Printer: Steps to switch on and switch off a computer; Difference between Turn Off, Stand By, Hibernate, and Restart.
Characteristics of computer, components of computer system – CPU, Memory, Storage Devices (Pen-drive, memory stick, CD-ROM and DVD) and I/O Devices (Input devices: Keyboard, mouse. Output devices: monitor, printer)
Encoding Schemes:ASCII and UNICODE

1.2. Keyboard Layout
Types of Keyboards - Physical Keyboard & Virtual Keyboard, Wireless & Wired Keyboard, Standard and Multimedia Keyboard

QWERTY Keyboard Layout: General Keys, Function Keys, Lock Keys, Lock Indicators (Lights), Cursor Control Keys, Numeric Keys, Numeric Keypad. Phonetic Keyboarding for non English script.

Setting for keyboard layout and language variations.

INSCRIPT Keyboard Layout: Importance of INSCRIPT Keyboard, Concept of using standard QWERTY keyboard with INSCRIPT overlay as at <http://tdil.mit.gov.in/isciichart.pdf>.

[Students may be encouraged to find out other relevant keyboard layouts for Indian language processing]

2. Efficient e- Typing 8 marks

2.1. Ergonomics: Layout, Correct sitting posture, Position of Keyboard, Mouse and Monitor.

2.2. Methods of Typewriting:

2.2.1. Touch Method of Typewriting

2.2.2. Sight Method of Typewriting

(Advantages and disadvantages of both the methods)

2.3. Positioning of fingers on the Keyboard according to touch method of Typewriting.

2.4. Use of Touch Typing Tutor Software (Online and Downloadable; Freeware and Open Source Software) for practice.

2.5. Tips for higher efficiency (Speed And Accuracy)

[Students may be encouraged to attain e-typing skills for an Indian language upto 5w/min]

3. Introduction to Word Processing (such as Writer) 10 marks

3.1. Creating, Saving and Opening a document in a Word Processor such as Writer.

3.2. Text styles (Bold, Italic, and Underline); Selecting Font Faces, Size and Color. Installing and using non-English fonts.

3.3. Unicode: compliant Fonts, Font Convertors

3.4. Text Alignment, Automatic Page Numbering with or without header and footer, Cut-Copy-Paste, Undo and Redo.

3.5. Preview & Printing a document with different features (page range, copies, page per sheet, scale to paper size)

3.6. Settings for page layout variations.

Class IX – Term II

Theory

- Maximum Marks: 30**
4. Software in Open domain 6marks
Open Source Software, Freeware, Shareware, , Role of OSS in Education for Creativity promotion, Licensing scheme, Copywriting, GPL(General Public Licence)
5. Ethical Practices in Computing 2Marks
Email etiquettes- proper structure and layout, case sentivity, disclaimer to email, care with abbreviations and emotions, gender sensitivity, refrain from copyright violation and piracy etc.
6. Creating and editing image and text document (GIMP) 12marks
6.1. The Toolbox : Introduction, Tool Icons, Color and Indicator Area, Tool Options, Selection Tools
6.2. Selection Features: Rectangle Selection ,Ellipse Selection, Free Selection (Lasso),Fuzzy selection (Magic wand),Select By Color, Intelligent Scissors, Foreground Select
6.3. Paint Tools :Brush Tools (Pencil, Paintbrush, Airbrush), Bucket Fill, Blend, Pencil, Paintbrush, Eraser, Airbrush, Ink, Clone, Heal, Perspective Clone, Blur/Sharpen, Smudge, Dodge/Burn
7. Working with spreadsheets (such as CALC may be used). 10marks
7.1. Creating, Saving & Opening a Spreadsheet
7.2. Selecting Cells and Ranges
7.3. Entering Numbers & Text in Spreadsheet
7.4. Simple Arithmetic Operations (+, -, *, /)
7.5. Copying Data from Spreadsheet into a Word Processing Document

PRACTICAL WORK
Class IX

Term I

70marks

- 1) **Introduction to computing : components and operations**
 - a. Demonstrate how to start and shut down the computer.
 - b. Use of various input, output and storage devices.
 - c. Getting fingers on the Keyboard and practicing each row of the Keyboard. (Home, Upper, Bottom, and Number Rows), Practicing Numeric Keypad, Using Touch Typing Tutor Software.
 - d. Practicing on both QWERTY and INSCRIPT keyboard layout and language variations.
- 2) **Efficient e-Typing**
Calculation of Gross (Running) Speed and Accuracy
Calculation of Net (Accurate) Speed and Accuracy

The Purpose of Assignment file extends much beyond the formality .The Assignment file should reflect and measure a student's continual improvement in e-Publishing & e-Office. An Assignment file must contain one document per month (in total 3 documents per term).Every month, an initial document without carrying out correction is to be kept in the file which will be known as initial document. The same document should be typed be carrying out correction, which will be known as final document. Both of these documents must be duly signed by the instructor. (Private candidate may put self-attested test document)

	Self-Assessment					
	Term 1			Term 2		
	Month 1	Month 2	Month 3	Month 1	Month 2	Month 3
Speed						
Accuracy						

An additional analysis report at the end of school term may be prepared by each student in the following format with self-assessment of speed and accuracy.

- 3) **Document preparation** : Create a document with the following features:
 - 1) Word Processing Text Styles (B,I,U)
 - 2) Selecting Font, Size and Color, Font Conversion
 - 3) Text alignment
 - 4) Automatic Page Numbering, Cut-Copy-Paste, Word-Count, Preview and printing of documents

Sample Case Studies

- a) Green chilly multi cuisine restaurant is creating a new branch in west extension of the city. Design a menu card highlighting the cuisine and the dishes with their prices.
- b) Hakeem Pharmaceutical Company is located at Arya Nagar Dehradun. Design a sample visiting card for a Medical Representative. Make 5 copies of the card on A4 sheet.
- c) Design a refreshment coupon for all the participants of Techno Fest organized by the school. Replicate as many copies of the coupon on A4 sheet to save the paper.

Term II

70marks

- 4) **Demonstrating various open office softwares**
Visit <http://www.openoffice.org> and explore and install the open office softwares specifically CALC and Writer. Take a simple example and re-write the program for an Indian language so as to incite for creative programming.
- 5) **Ethical Practices:**
 - 1) Identify cases of violation of ethical practices.
- 6) **Image Creation and editing** with the help of following tools:
 - 2) Selection Features: Rectangle Selection ,Ellipse Selection, Free Selection (Lasso),Fuzzy selection (Magic wand),Select By Color, Intelligent Scissors, Foreground Select

- 3) Paint Tools :Brush Tools (Pencil, Paintbrush, Airbrush),Bucket Fill, Blend, Pencil, Paintbrush, Eraser, Airbrush, Ink, Clone, Heal, Perspective Clone, Blur/Sharpen, Smudge, Dodge/Burn

Sample Case Studies :

- a) Pick an image of an automobile. Delete the picture background using selection tools. Insert the edited picture in word processing software and write its specifications
- b) Design a Rangoli(Replication of Geometrical Patterns) using using refreshment coupon for all the participants of Techno Fest organized by the school. Replicate as many copies of the coupon on A4 sheet to save the paper.
- 7) **Spreadsheet Preparation:** Using Arithmetic Operations (+, -, *, /),and inserting spreadsheet into word document.

Sample Case Studies:

- a) Prepare a Report Card with the following information
- School Name
 - Rollno
 - Name of the student
 - Class and Section
- It should also comprise of following column heads
- Name of the Subjects
 - Maximum marks
 - Highest marks scored in the class
 - Marks scored by the student
- Use arithmetic operators and cell addresses
1. To compute the total marks obtained
 2. Compute the percentage in each subject
 3. Find the difference between the highest marks scored in the class and the marks scored by the student in each subject.
- b) Prepare a Weather Forecast Report with the following headings
- Name of a city
 - Maximum temperature of the weeks of the month
 - Minimum temperature of the weeks of the month
 - Find the difference between maximum and minimum temperature of each week
 - Find average maximum temperature of the month
 - Find average minimum temperature of the month

Project

Project is initiated in class IX and continues to class X.

	Practical File	Hands on Experience and viva	Total
Term1	20	50	70
Term2	20	50	70