

Dear Students!!

In this e-book of [12th class](#), study material of computer science is being sent to you as per new syllabus (2023-24). You can easily prepare your test / papers by reading these notes and watching the video lectures given below. Following are the links of the video lectures in blue colour. Watch these video lectures by clicking on the relevant link of chapter to have better understanding of various concepts.



12th Class - Monthly distribution of Computer Science Syllabus & Video Lecture Links (Pbi)

Month	Chaper & Its Name	Link of Video Lecture
April	Chapter-1 Office Automation & Typing (Explanation)	https://youtu.be/HEJpX01lwpM
	Chapter-1 Office Automation & Typing (Solution)	https://youtu.be/LwOpv8j92bo
May	Chapter -2 Control Statements (Explanation)	https://youtu.be/T6zvUn61x-k
	Chapter -2 Control Statements (Solution)	https://youtu.be/JXe2kGAJ7WY
July	Chapter -3 Computer Networks	https://youtu.be/6YULI1naDZI
Aug	Chapter -4 Current Trends in Information Technology	https://youtu.be/YHtjpOWi-ZY
Oct	Chapter -5 Artificial Intelligence & Expert System	https://youtu.be/rvn2FpS1PKQ
Nov	Chapter -6 Digitalization	https://youtu.be/galuEBdTkul
Dec	Chapter -7 E Governance (Part-2)	Under Preparation
Jan	Chapter -8 Image Editing & File Conversion Tools	Under Preparation
Feb	Chapter -9 Audio & Video Editing	Under Preparation

Practical Video Lectures for Chapter -2 (Control Statements)

C Language Practical -1	https://youtu.be/8hg3BJAyBqE
C Language Practical -2	https://youtu.be/v_lw8wmfIP4
C Language Practical -3	https://youtu.be/RBq--darc0I

Following is the Link of Playlist for detailed Lectures on C Programming

<https://youtube.com/playlist?list=PLja3EaJFAjmYjeAcDs0ZQdVmx7liCtg5P>

PLEASE DO NOT FORGET TO LIKE, SHARE AND SUBSCRIBE OUR YOUTUBE CHANNEL

 **YouTube** <http://youtube.com/c/computersciencepunjab>

Prepared By:

Vikas Kansal and Sukhwinder Singh

Computer Faculties, S.U.S. Govt. (G) Sen. Sec. School, Sunam Udham Singh Wala (Sangrur)

Please use the following link to download the study material/e-books/e-contents for 6th to 12th classes:

<http://cspunjab.nirmancampus.co.in/study.php>

Que:1 Multiple choice question:

1. _____ tool allows us to select a drawing with a free hand.

- a. Fuzzy Selection **b. Lasso** c. Text d. Bucket Fill

2. **SHIFT + C** is a shortcut for _____

- a. To Create Duplicate Image b. To Delete Layer
c. To Copy of an image **d. To Crop an Image**

3. Scale option is used to change the _____ of an image.

- a. Color **b. Size** b. Area d. All of the above

4. _____ is known as group of sheets looking at each other.

- a. Masking b. Tools **c. Layers** d. None of the above

5. _____ helps to make a duplicate copy of the active layer

- a. Smudge Tool b. Dodge Tool c. Perspective Tool **d. Duplicate Layer**

Que:2 Fill in the blanks:

1. To resize the layer _____ tool is used.

2. To move the layers _____ tool is used.

3. The quality of the picture decreases when the picture is _____

4. An important part of the Image Window is _____ where the picture is shown.

- Ans:** 1. Scale 2. Move 3. Scaled 4. Canvas

Que:3 Write shortcut Keys:

- | | |
|-----------------------------------|-----------|
| I. For Creating a New File | Ctrl+N |
| II. For Opening a File | Ctrl+O |
| III. For Creating duplicate Image | Ctrl+D |
| IV. For Viewing Image Properties | Alt+Enter |
| V. For Cropping the Image | Shift+C |
| VI. For Merging Layers | Ctrl+M |

Que:4 Short Answer Type Questions.**Q:1 What is Image Editing?**

Ans: The image editing process is also called image re-touching. It is a process by which we make required changes to the images stored in digital format. We often make these changes to make the pictures look better. While editing the image, we can perform various tasks on the image such as: enlarging or shrinking the image size, adjusting the brightness and contrast, crop, rotate, flip etc. For these tasks we use image editing software in the computer. For example: Photoshop, GIMP, etc.

Q:2 What are Layers?

Ans: Layers means Stack of Slides. Layers are groups of sheets that appear on top of each other. An image is composed of multiple layers. Layers can be set one above the other. In GIMP, we can perform many operations related to layers, such as: insert, delete, merge layers, etc.

Q:3 How can a duplicate image be made?

Ans: Following are the steps to make a duplicate copy of image in GIMP:

1. Click on the Image menu.
2. Click on the Duplicate option

Duplicate copy of image can also be made using shortcut key CTRL + D.

Q:4 Write two ways to open the picture.

Ans: Here's how to open a pre-created image in GIMP:

1. Click on File → Open
2. Open dialog box will appear. Select the image that we want to open and click on the Open button.

Que:4 Long Answer Type Questions.

Q:1 Write down the names of any 4 tools of GIMP and explain the usage.

Ans: Following is the description of 4 commonly used GIMP's tools:

1. **Eraser Tool:** This tool is used to erase the area of the current layer. This tool can be activated by clicking on the Eraser icon at the Tool Box or by using SHIFT + E.
2. **Text Tool:** This tool is used to write text on pictures. Click on the Tools → Text command to use this tool or it can be activated by clicking on the A symbol in the Tool Box.
3. **Move Tool:** This tool is used to move selection (to change position), i.e. text, layers etc. Click on the Tools → Transform Tools → Move command to use this tool or click the Move Tools icon from the Tool Box.
4. **Scale Tool:** This tool is used to scale layers, objects, i.e. to change their size. Click on the Tools → Transform Tools → Scale option or SHIFT + S command to use this tool.

Q:2 How to resize a picture in GIMP?

Ans: Sometimes we need to resize the image, i.e. increase or decrease the width or height of the image. Modifying these dimensions of the image is called resizing. The steps to resize the image are as follows:

1. Click on the Image menu.
2. Click on Scale Image.
3. The Scale Image dialog box opens. Change the Width and Height values as required.

GIMP also allows us to set the measurement units such as px, percentage, centimeters, metres, inches, feet etc.