Assignment -1

Q1: What are the four fundamental parts of computer? Explain it with the help of diagram.
Ans. A computer has four main components: **Input Units, the central processing unit or CPU, the Primary memory, and Output units**. Input Unit - The devices to input information, such as a keyboard, and mouse

Q2: Discuss about the classification of computers based on size and capacity.
Ans. On the basis of size there are four types of computer.
They are **minicomputer, micro computer, mainframe computer and super computer**.

Q3: What is the meaning of computer generation? How many Computer Generations are defined? What technologies were/are used?
Ans. he generation term was used to distinguish between varying hardware technologies. Nowadays, generation includes both hardware and software, which together make up an entire computer system. There are **five computer generations** known till date.

- First Generation (1940-1956)
- Second Generation (1956-1963)
- Third Generation (1964-1971)
- Fourth Generation (1971-2010)
- Fifth Generation (Present Day)

Q4: Differentiate between Volatile & Non- Volatile memories.
Ans. Volatile memory is computer storage that only maintains its data while the device is powered. ... Volatile memory contrasts with non-volatile memory, which **does not lose content when power is lost**. Non-volatile memory has a continuous source of power and does not need to have its memory content periodically refreshed.

Q5: Distinguish among system software, application software and open source software on the basis of their features.
Ans. System software is used for operating computer hardware. On other hand Application software is used**by user to perform specific task**. System software are installed on the computer when operating system is installed. On other hand Application software are installed according to user's requirements.

Q6. a) Create a file in MS-word to insert a paragraph about yourself and save it with file name "yourself". Describe all steps involved in it.
Ans. Step 1: Open Ms word on your system. Step 2: Click on the new file when you open the word file when the dialog box appear. Step 3: Once this click on **Blank doc** under the recent section, it will get in bold or highlighted by default. Step 4: Click on the create A new blank doc will open.
Then click ctrl+S, and save the document.

Q6 b) Write steps regarding followings

 To change the font style

1. Ans. Select the text you want to modify.
2. Select the Home tab and locate the Font group.
3. Click the drop-down arrow next to font style box.
4. Font style menu appears.
5. With a left click select the desired font style

 To change the font size

1. Ans. Select the text that you want to modify.
2. In Home tab locate the Font group.
3. In Font group click the drop-down arrow next to font size box.
4. Font size menu appears.
5. Select the desired font size with a left click.
6. Select the text and click the increase or decrease font size buttons.

 To change the font color

1. Ans. On the Home tab, in the Font group, choose the arrow next to Font Color, and then select a color. You can also use the formatting options on the Mini toolbar to quickly format text.

 To highlight (in yellow) the line that reads “need to get IMS’s address”.

Q7. Create a file in MS-Word for the following document and save it with file name ‘ms_word’. Describe
all steps involved in it.

1. Ans. Open Word. Or, if Word is already open, select File > New.
2. In the Search for online templates box, enter a search word like letter, resume, or invoice. Or, select a category under the search box like Business, Personal, or Education.
3. Click a template to see a preview. ...
4. Select Create.

SAVE THE DOCUMENTS :

1. Click the File tab.
2. Click Save As.
3. Click Browse, and then select the location where you want to save your file.
4. In the Save as type list, click OpenDocument Text.
5. Give your file a name, and then save it.

Q8. Create a file in MS-word for the following document and save it with file name ‘equations’. Describe
all steps involved in it.

1. Ans . Open Word. Or, if Word is already open, select File > New
2. Then select **Insert** > **Equation** or press Alt + **=**.

3. To use a built-in formula, select **Design** > **Equation**.
4. To create your own, select **Design** > **Equation** > **Ink Equation**.
5. Use your finger, stylus, or mouse to write your equation.
6. Select **Insert** to bring your equation into the file.
7. Click on file > save file
8. Click Browse, and then select the location where you want to save your file.
9. In the Save list, click OpenDocument Text.
10. Give your file a name 'equations', and then save it.

Q9. Create a file in MS-word that convert existing highlight text to table as shown below and save it as
file name 'text_to_table'. Describe all steps involved in it.
Ans. To convert text to a table or a table to text, start by clicking
the **Show/Hide** paragraph mark on the **Home**tab so you can see how text is separated in your document.

1. Insert separator characters—such as commas or tabs—to indicate where to divide the text into table columns.
2. Use paragraph marks to indicate where you want to begin a new table row.
3. Select the text that you want to convert, and then click **Insert** > **Table** > **Convert Text to Table**.
4. In the **Convert Text to Table** box, choose the options you want.
5. Under **Table size**, make sure the numbers match the numbers of columns and rows you want.
6. Under **AutoFit behavior**, choose how you want your table to look. Word automatically chooses a width for the table columns.
7. Under **Separate text at**, choose the separator character you used in the text.
8. Click **OK**. The text converted to a table should look something like this:

Red, yellow	blue, green	orange, purple
Red, yellow	blue, green	orange, purple

SAVE THE DOCUMENTS :

6. Click the File tab.
7. Click Save As.
8. Click Browse, and then select the location where you want to save your file.
9. In the Save as type list, click OpenDocument Text.
10. Give your file a name, and then save it.

Q10. Create a file in MS-Word to insert a table in the document. Describe all steps involved in it.
The basic steps for creating a standard table in Microsoft Word (2013) are:

1. Open a blank Word document
2. In the top ribbon, press *Insert*
3. Click on the *Table* button

4. Either use the diagram to select the number of columns and rows you need, or click *Insert Table* and a dialog box will appear where you can specify the number of columns and rows.

5. The blank table will now appear on the page. Alter it as necessary. Standard features like **bold**, *italics*, and underline are still available! These items may be helpful for creating headings or calling out certain items in the table.

Q11. Create a following worksheet in MS-excel and save it with name 'book1'.

Ans. **How To Generate A List Of Sheet Names From A Workbook Without VBA**

1. 1. Go to the Formulas tab.
2. 2. Press the Define Name button.
3. 3. Enter SheetNames into the name field.
4. 4. Enter the following formula into the Refers to field.
5. =REPLACE(GET.WORKBOOK(1),1,FIND("]",GET.WORKBOOK(1)),"")
6. 5. Hit the OK button.

Save a worksheet

1. 1. Right-click the worksheet name tab.
2. 2. Click select Move or Copy.
3. 3. Click on the Move selected sheets to Book drop-down menu. Select (new book).
4. 4. Click OK. Your new workbook opens with your moved worksheet. ...
5. 5. Click File > Save in your new workbook. File name is book1

Q12. Calculate the following things of a range (C2:C11) of data in the worksheet created in question no. 10.

(a) the sum of the marks using AutoSum in a range of cells (C2:C11)

Ans. If you need to sum a column or row of numbers, let Excel do the math for you. Select a cell next to the numbers you want to sum,

click AutoSum on the Home tab, press Enter, and you're done. When you click AutoSum,

Excel automatically enters a formula (that uses the SUM function) to sum the numbers.

(b) average of the marks in a range of cells (C2:C11)

Ans. **Use AutoSum to quickly find the average**

1. Click a cell below the column or to the right of the row of the numbers for which you want to find the average.
2. On the HOME tab, click the arrow next to AutoSum > Average, and then press Enter.
3.

(c) highest marks in a range of cells (C2:C11)

Ans. **Calculate the smallest or largest number in a range**

1. Select a cell below or to the right of the numbers for which you want to find the smallest number.
2. On the Home tab, in the Editing group, click the arrow next to AutoSum.
3. click Min (calculates the smallest) or Max (calculates the largest), and then press ENTER.

(d) minimum marks in a range of cells (C2:C11)

Ans. **Calculate the smallest number in a range**

1. Select a cell below or to the right of the numbers for which you want to find the smallest number.
2. On the Home tab, in the Editing group, click the arrow next to AutoSum.
3. click Min (calculates the smallest) or Max (calculates the largest), and then press ENTER.

Q13 a) Describe various steps involved in the following

To modify column width of a worksheet

Ans. **Set a column to a specific width**

1. 1. Select the column or columns that you want to change.
2. 2. On the Home tab, in the Cells group, click Format.
3. 3. Under Cell Size, click Column Width.
4. 4. In the Column width box, type the value that you want.
5. 5. Click OK.

 To modify the row height of a worksheet

Set a row to a specific height

1. 1. Select the row or rows that you want to change.
2. 2. On the Home tab, in the Cells group, click Format.
3. 3. Under Cell Size, click Row Height.
4. 4. In the Row height box, type the value that you want, and then click OK.

 To delete rows and columns of a worksheet

Ans. **If you don't need any of the existing cells, rows or columns, here's how to delete them:**

1. Select the cells, rows, or columns that you want to delete.
2. Right-click, and then select the appropriate delete option
3. for example, Delete Cells & Shift Up, Delete Cells & Shift Left, Delete Rows, or Delete Columns.

Q13 b) Describe following terms in the worksheet

 Absolute reference and relative reference in formula

Ans. Relative and absolute references behave differently when copied and filled to other cells. Relative references change when a formula is copied to another cell. Absolute references, on the other hand, **remain constant no matter where they are copied**.

 Cell address

Ans. A cell reference, or cell address, is **an alphanumeric value used to identify a specific cell in a spreadsheet**. Each cell address contains 'one or more letters' followed by a number. The letter or letters identify the column and the number represents the row

Q14. a) What tools are available to customize our PowerPoint presentation?

Ans. Go **to Slide Show > Custom Slide Show**, and then select Custom Shows. In the Custom Shows dialog box, select New. Under Slides in presentation,

click the slides that you want to include in the main custom show, and then click Add.

Q14 b) Write the steps for the following action for creation of power point presentation

- Open a Blank presentation

Ans. **When beginning a new project in PowerPoint, you'll often want to start with a new blank presentation.**

1. 1. Select the File tab to go to Backstage view.
2. 2. Select New on the left side of the window, then click Blank Presentation.
3. 3. A new presentation will appear.

- Save the presentation as Lab1.pptx

Ans. **The following are the basic steps to save a presentation.**

1. Step 1 − Click on the File tab to launch the Backstage view and select Save.
2. Step 2 − In the Save As dialog, type in the file name and click "Save".
3. Step 3 − The default file format is . pptx.

- Add a Title to the first slide: the name of your college

Ans. **Use the Layout option to title a slide**

1. Select the slide whose layout you will change so that it can have a title.
2. Click Home > Layout.
3. Select Title Slide for a standalone title page or select Title and Content for a slide that contains a title and a full slide text box. ...
4. Select the Click to add title text box.

- Type your first name and last name in the Subtitle section
- Add a New Slide which has a Title and Content

Q15. Write steps for creation of a set of PowerPoint slides that demonstrates your skill to use the tools of PowerPoint. It should include the following things

Ans. **Create a presentation**

1. Open PowerPoint.
2. In the left pane, select New.
3. Select an option: To create a presentation from scratch, select Blank Presentation. To use a prepared design, select one of the templates. To see tips for using PowerPoint, select Take a Tour, and then select Create, .

- Title slide &bullet list

Ans.TITLE SLIDE : The Title Slide layout is the **default layout when you open a blank presentation in PowerPoint**. It comprises two text placeholders: the first for the presentation title and the second for a subtitle. The Title Only layout is the same as a Title Slide except that it doesn't have a subtitle placeholder.

BULLET LIST : A bulleted list is **an unordered list of items where every item has a graphical bullet**. The bullets may be characters of different fonts, as well as graphical icons. Bulleted lists help the author structure the text in a better way - provide a list of application components, list of usage scenarios, etc.

- Inserting Excel Sheet

Ans. Hold down SHIFT, and then select the same number of existing sheet tabs of the

worksheets that you want to insert in the open workbook. For example, if you want to add three new worksheets, select three sheet tabs of existing worksheets. On the Home tab, in the Cells group, click Insert, and then click Insert **Sheet**.

 Clip art and Text

Ans. **Clip art** (also clipart, clip-art) is a type of graphic art. ... However, most clip art today is created, distributed, and used in a digital form. Since its inception, clip art has evolved to include a wide variety of content, file formats, illustration styles, and licensing restrictions.

 Slide show effects

Ans. Slide Effect is **a presentation tool providing enhanced transitions and effects**. Using a standard Presentation Software user interface, people can create slide presentation with movies and images in a simpler way than using a video editing software.

Part -2

Q16. What is the difference between Machine Language and High Level Language?

Ans. We will now understand the differences between High-Level and Low-Level programming languages −

High-Level Language	Low-level language
It can be considered as a programmer-friendly language.	It is considered as a machine-friendly language.
It requires a compiler/interpreter to be translated into machine code.	It requires an assembler that would translate instructions.
It can be ported from one location to another.	It is not portable.
It is easy to understand.	It is difficult to understand.
It is easy to debug.	It is difficult to debug.
It is less memory efficient, i.e., it consumes more memory in comparison to low-level languages.	It consumes less memory.

Q17. Discuss about different data types of C programming Language.

Ans. Variables in C are associated with data type. Each data type requires an amount of memory and performs specific operations.

There are some common data types in C −

- **int** − Used to store an integer value.
- **char** − Used to store a single character.
- **float** − Used to store decimal numbers with single precision.
- **double** − Used to store decimal numbers with double precision.

The following table displays data types in C language −

Data Types	Bytes	Range
short int	2	-32,768 to 32,767
unsigned short int	2	0 to 65,535
unsigned int	4	0 to 4,294,967,295
int	4	-2,147,483,648 to 2,147,483,647
long int	4	-2,147,483,648 to 2,147,483,647
unsigned long int	4	0 to 4,294,967,295
signed char	1	-128 to 127
unsigned char	1	0 to 255
float	4	1.2E-38 to 3.4E+38
double	8	2.3E-308 to 1.7E+308

Here is the syntax of datatypes in C language,

```
data_type variable_name;
```

Q18. Find the output of the following expressions
a) X=20/5*2+30-5
Ans. X=33

b) Y=30 – (40/10+6) +10
Ans. Y=30

c) Z= 40*2/10-2+10
Ans. Z=16

Q19. Describe the syntax of the following statements
a) If – else statement
Ans. The if/else statement **executes a block of code if a specified condition is true**. If the condition is false, another block of code can be executed. The if/else statement is a part of JavaScript's "Conditional" Statements, which are used to perform different actions based on different conditions.

b) for loop
Ans. The for/in statement loops **through the properties of an object**. The block of code inside the loop will be executed once for each property. ... for - loops through a block of code a number of times. for/in - loops through the properties of an object.

c) while loop
Ans. A "While" Loop is used to repeat a specific block of code an unknown **number of** times, until a condition is met. For example, if we want to ask a user for a number between 1 and 10, we don't know how many times the user may enter a larger number, so we keep asking "while the number is not between 1 and 10".

d) do-while loop
Ans. **iteration-**statement: do statement while (expression) ; The expression in a do-while statement is evaluated after the body of the loop is executed. Therefore, the body of the loop is always executed at least once. The expression must have arithmetic or pointer type

Q20. Find the output of the following program segments
a) b) c)

```
#include <stdio.h>
int main()
{
int i;
for (i=1; i<2; i++)
{
printf( "IMS Ghaziabad\n");
}
}
```

```
#include <stdio.h>
int main()
{
int i = 1;
while ( i <= 2 )
{
printf( "IMS Ghaziabad\n");
i = i + 1;
```

```
}
}

#include <stdio.h>
void main()
{
int a = 10, b=100;
if( a > b )
printf( "Largest number is %d\n”, a);
else
printf( "Largest number is %d\n”, b);
```