| **Practical Number** | 02 |
| --- | --- |
| **Areas covered** | Data Input & output |

Write a C program for each of the following question

**Question 1**

Have the computer print

**HI, HOW OLD ARE YOU?**

on one line. The user then enters his or her age immediately after the question mark. The computer then skips two lines and prints on two consecutive lines.

**WELCOME (age)**

**LET’S BE FRIENDS!**

Write a complete C program to do the above.

#include<stdio.h>

int main()

{

int age;

printf("HI,HOW OLD ARE YOU? ");

scanf("%d",&age);

printf("\n\nWELCOME %d\n",age);

printf("LET’S BE FRIENDS!\n");

}

**Question 2**

Write a program which uses the **format commands** with modifiers to print the following output:

| **2** | **4** | **8** |
| --- | --- | --- |
| **3** | **9** | **27** |
| **4** | **16** | **64** |
| **5** | **25** | **125** |

***Remark:***

***Observe how format commands are used in the following program.***



#include <stdio.h>

int main() {

printf("%10d%5d%5d\n%10d%5d%5d\n%10d%5d%5d\n",2,4,8,3,9,27,4,16,64);

}

**Question 3**

Write a simple program to evaluate the average speed of a car traveled in meters per second (ms-1). Given that



Try using integer variables. What would be the problem? Why? How to fix the problem?

When we write the program using int variables it is taking user inputs but is don’t display any output.

#include <stdio.h>

int main() {

float distance, time, speed;

printf("Enter The Distance Traveled In Meters- ");

scanf("%f", &distance);

printf("Enter The Time Taken In Seconds - ");

scanf("%f", &time);

speed = distance / time;

printf("Average Speed Is %.2f m/s\n", speed);

return 0;

}

**Question 4**

Convert a temperature reading in degrees Fahrenheit to degrees Celsius, using the formula

**C = ( 5 / 9 ) x ( F – 32 )**

Test the program with the following values: 68, 150, 212, 0, -22, -200 (degree Fahrenheit).

#include <stdio.h>

int main() {

float fa, ce;

printf("Enter Temperature In Degrees Fahrenheit - ");

scanf("%f", &fa);

ce =(5.0/9.0)\*(fa - 32);

printf("Temperature In Degrees Celsius - %f\n", ce);

return 0;

}